

1 IN THE UNITED STATES DISTRICT COURT  
2 FOR THE EASTERN DISTRICT OF TEXAS  
3 MARSHALL DIVISION  
4 ENTROPIC COMMUNICATIONS, LLC, ) (  
5 PLAINTIFF, ) ( CIVIL ACTION NO.  
6 ) ( 2:22-CV-125-JRG  
7 VS. ) ( MARSHALL, TEXAS  
8 ) (  
9 CHARTER COMMUNICATIONS, INC., ) ( JUNE 13, 2023  
10 DEFENDANT. ) ( 9:02 A.M.

11  
12 CLAIM CONSTRUCTION HEARING  
13 BEFORE THE HONORABLE RODNEY GILSTRAP  
14 UNITED STATES CHIEF DISTRICT JUDGE  
15

16 FOR THE PLAINTIFF: Mr. James A. Shimota  
17 Ms. Katherine L. Allor  
18 Mr. Jason A. Engel  
19 K&L Gates, LLP  
70 West Madison Street  
Suite 3100  
Chicago, IL 60602  
20 COURT REPORTER: Ms. Shelly Holmes, CSR, TCRR  
21 Official Court Reporter  
22 Honorable Robert W. Schroeder III  
United States District Judge  
Eastern District of Texas  
Texarkana Division  
23 500 North State Line Avenue  
24 Texarkana, TX 75501  
shelly\_holmes@txed.uscourts.gov

25 (Proceedings recorded by mechanical stenography, transcript  
produced on a CAT system.)

1 FOR THE PLAINTIFF:

Mr. Kenneth H. Bridges  
Bridges IP Consulting  
2113 19th Avenue S  
Nashville, TN 37212

Mr. Matthew A. Blair  
K&L Gates, LLP  
2801 Via Fortuna  
Suite 650  
Austin, TX 78746

Mr. Connor J. Meggs  
K&L Gates, LLP  
10100 Santa Monica Boulevard  
8th Floor  
Los Angeles, CA 90067

Mr. J. Wesley Hill  
Ward, Smith & Hill, PLLC  
1507 Bill Owens Parkway  
Longview, TX 75604

12 FOR THE DEFENDANT:

Mr. David S. Benyacar  
Kaye Scholer  
425 Park Avenue  
New York, NY 10022

Mr. Deron R. Dacus  
The Dacus Firm, PC  
821 ESE Loop 323  
Suite 430  
Tyler, TX 75701

09:02:22 1 COURT SECURITY OFFICER: All rise.

09:02:24 2 THE COURT: Be seated, please.

09:02:32 3 This is the time set for claim construction in the  
09:03:14 4 Entropic Communications versus Charter Communications  
09:03:16 5 matter, this is Civil Case No. 2:22-CV-125.

09:03:20 6 Let me ask for announcements on this record.

09:03:21 7 What says the Plaintiff, Entropic?

09:03:24 8 MR. HILL: Good morning, Your Honor. Wesley Hill  
09:03:28 9 on behalf of the Plaintiff, Entropic. With me here today,  
09:03:31 10 Your Honor, I have Jim Shimota, Ken Bridges, Katy Allor,  
09:03:37 11 Jason Engel, Connor Meggs, and Matt Blair. And we are  
09:03:41 12 ready for our claim construction hearing.

09:03:44 13 Your Honor, I do have one note for the record  
09:03:45 14 before we get started, but I'll sit down for the other side  
09:03:51 15 to make announcements first.

09:03:51 16 THE COURT: All right, Mr. Hill.

09:03:53 17 What's the announcement for the Defendant,  
09:03:56 18 Charter?

09:03:57 19 MR. DACUS: Good morning, Your Honor. Deron Dacus  
09:03:59 20 on behalf of Charter. Here with me is David Benyacar. And  
09:03:59 21 also from Charter, Kirill Abramov. And we're ready to  
09:04:07 22 proceed, Your Honor.

09:04:07 23 THE COURT: All right. Thank you, Mr. Dacus.

09:04:07 24 All right. Mr. Hill, you piqued my interest.

09:04:10 25 What have you got?

09:04:11 1 MR. HILL: I wish it was that interesting, Your  
09:04:11 2 Honor, but I'm afraid it's not.

09:04:12 3 I just wanted to alert the Court, Your Honor. We  
09:04:14 4 filed a notice of a corrected Exhibit No. 7 to our claim  
09:04:20 5 construction opening brief yesterday, yesterday evening  
09:04:23 6 about 7:30. It's ECF No. 117. It replaces ECF No. 97-7.

09:04:30 7 Your Honor, what we discovered in the final review  
09:04:33 8 in preparation for the hearing is that in uploading the  
09:04:37 9 declaration of our expert for the record, the exhibits to  
09:04:41 10 the declaration that are referenced in it were omitted.  
09:04:43 11 They had previously been served. They were in the record  
09:04:47 12 as part of the claim construction process exchanges with  
09:04:51 13 the other side, but they were omitted from the brief.

09:04:53 14 And so we filed a notice to provide that complete  
09:04:56 15 Exhibit No. 7 so that it would be of record for the Court.  
09:05:00 16 But I just wanted to highlight that because it was a  
09:05:02 17 last-minute change.

09:05:03 18 THE COURT: Have you received or have you been  
09:05:05 19 told there's any objection to this from the other side?

09:05:07 20 MR. HILL: I have not. Granted, it was -- it's  
09:05:10 21 short notice for them, Your Honor, but we have not received  
09:05:13 22 any objection.

09:05:13 23 THE COURT: All right. Does Defendant have an  
09:05:14 24 opinion on this?

09:05:15 25 MR. DACUS: We don't have any objection, Your

09:05:17 1 Honor. That's fine.

09:05:17 2 THE COURT: All right. Then without objection,  
09:05:19 3 I'll note that correction.

09:05:20 4 And we'll proceed with argument on claim  
09:05:24 5 construction addressing the various disputed terms.

09:05:27 6 We'll start with "a data networking engine  
09:05:31 7 implemented in a first circuit that includes at least one  
09:05:36 8 processor" and "a cable modem engine implemented in a  
09:05:39 9 second circuit which includes at least one processor" from  
09:05:44 10 Claim 18 of the '775 patent.

09:05:47 11 Plaintiff is proposing no construction is  
09:05:49 12 necessary, and Defendant alleges that the terms are  
09:05:51 13 indefinite.

09:05:52 14 Let me hear from the Plaintiff on this first.

09:05:56 15 MS. ALLOR: Good morning, Your Honor.

09:06:10 16 THE COURT: Good morning.

09:06:11 17 MS. ALLOR: So I'd like to start with --

09:06:17 18 THE COURT: Why don't we start with you  
09:06:19 19 identifying yourself for the record?

09:06:20 20 MS. ALLOR: Oh, I'm sorry. Ms. Allor.

09:06:22 21 THE COURT: Thank you. Please proceed.

09:06:23 22 MS. ALLOR: Okay. So here on Slide 5, I've  
09:06:26 23 actually grouped the first four terms, and I was hoping we  
09:06:29 24 could address all four of them at once since there is this  
09:06:32 25 issue of separateness that the -- that Charter has been

09:06:36 1 arguing with respect to these four terms. And so I think  
09:06:40 2 it might be helpful to take them all up at the same time if  
09:06:44 3 that would be amenable to you.

09:06:45 4 THE COURT: Well, I had planned to hear argument  
09:06:47 5 concurrently on Terms 2 and 3.

09:06:52 6 MS. ALLOR: That's fine. I can take --

09:06:54 7 THE COURT: I don't have -- I don't have -- the  
09:06:57 8 more we can consolidate the process, the better as far as  
09:07:00 9 I'm concerned.

09:07:00 10 Does this create any problem for the Defendant if  
09:07:03 11 we hear all four of them argued concurrently?

09:07:06 12 MR. BENYACAR: It doesn't, Your Honor.

09:07:07 13 THE COURT: All right. Then let's just take up  
09:07:09 14 all four at the same time or the first four.

09:07:11 15 MS. ALLOR: Okay. Thank you, Your Honor.

09:07:13 16 So the main issue that permeates these four terms  
09:07:17 17 is Charter has been alleging that there is this issue of  
09:07:21 18 separateness, that they can't understand how the data  
09:07:25 19 networking engine and the cable modem engine can be  
09:07:26 20 separate from one another, implemented each in a circuit,  
09:07:30 21 and be connected by a data bus.

09:07:33 22 THE COURT: Is it possible that your view of this  
09:07:35 23 separateness runs to the issue of functionality and their  
09:07:41 24 issue as to separateness runs as to physical separation?  
09:07:44 25 Is that where the parties divide?

09:07:46 1 MS. ALLOR: That is correct.

09:07:47 2 THE COURT: Okay.

09:07:48 3 MS. ALLOR: And Charter's brief doesn't make clear  
09:07:51 4 what their physical separateness would actually be. And so  
09:07:55 5 the specification tells us that it is a functional  
09:07:59 6 separateness -- sorry about that.

09:08:05 7 And so let's start with, you know, one of the main  
09:08:07 8 terms in the first two phrases, which is "circuit." Both  
09:08:11 9 sides agree a "circuit" is a well-known term. There's a  
09:08:14 10 dictionary definition provided by Dr. Almeroth, Charter's  
09:08:17 11 expert.

09:08:18 12 And if we look at the second part of that  
09:08:19 13 definition: A combination of electrical components  
09:08:24 14 interconnected to perform a particular task.

09:08:26 15 So this part of the definition is really what's  
09:08:29 16 being described in the '775 patent. It's separate  
09:08:34 17 functional tasks. The cable modem engine is operating  
09:08:38 18 separately from the data networking engine.

09:08:40 19 And so Dr. Almeroth, Charter's expert, says  
09:08:44 20 because of the way the claim language is set up, you can't  
09:08:48 21 define the boundaries of the circuit. But he doesn't  
09:08:52 22 dispute that circuit is well-known.

09:08:54 23 If we turn to Slide 7, here are the two figures  
09:08:58 24 from the '775 patent that show these two engines. So the  
09:09:03 25 top in blue is the data networking engine, and the bottom

09:09:06 1 in red is the cable modem engine.

09:09:07 2 The Figure 1 shows it in three blocks showing, you  
09:09:15 3 know, a data networking engine at the top, and then there's  
09:09:19 4 two processors within the cable modem engine.

09:09:21 5 But the specification tells us we don't have to  
09:09:24 6 have two processors in the cable modem engine. We just  
09:09:27 7 need to have the cable modem engine functionally separate  
09:09:31 8 from the data networking engine.

09:09:32 9 And so if you look at Figure 2, you can see the  
09:09:36 10 functional blocks that are part of each of those two  
09:09:38 11 engines. And you see the data bus that connects those two.

09:09:42 12 Dr. Almeroth doesn't dispute that you could have  
09:09:47 13 those circuits be separate. His problem is -- and  
09:09:50 14 Charter's problem is, is that you can draw the box multiple  
09:09:54 15 ways. And that is not a reason to find the claim language  
09:09:57 16 indefinite.

09:09:58 17 A POSITA could figure out how to draw the box  
09:10:02 18 correctly. The specification makes very clear the  
09:10:04 19 functions that are part of the cable modem engine compared  
09:10:07 20 to the data networking engine. And so there's no confusion  
09:10:11 21 as to the language of the terms. Their -- their position  
09:10:14 22 is that those cannot be connected by a data bus and still  
09:10:18 23 be considered separate.

09:10:19 24 And we disagree with that.

09:10:22 25 So if you look at the actual language of the



09:10:27 1 claim, it's very clear the functions that each are  
09:10:30 2 performing.

09:10:31 3           So on Slide 8, I've got the first half of the  
09:10:34 4 claim that's directed to the data networking engine. We  
09:10:36 5 have a circuit, at least one processor programmed with  
09:10:40 6 software that causes the data networking engine to perform  
09:10:42 7 home networking functions.

09:10:45 8           And then the second half of the claim is the cable  
09:10:48 9 modem engine. Again, a second circuit, at least one  
09:10:51 10 processor programmed with software that causes the cable  
09:10:56 11 modem engine to perform cable modem functions. And then it  
09:10:59 12 lists out those cable modem functions.

09:11:03 13           So there's no -- there's no lack of clarity as to  
09:11:06 14 what this claim language is directed to. A POSITA  
09:11:08 15 understands what a processor is. A POSITA understands what  
09:11:10 16 a circuit is. And they understand the functions that each  
09:11:13 17 of those are supposed to be performing.

09:11:15 18           And so moving on to the actual issue of functional  
09:11:24 19 partitioning, which relates to the data bus, the  
09:11:27 20 specification describes how you would localize the  
09:11:30 21 functions of each in the cable modem engine versus the data  
09:11:34 22 networking engine. And it describes that those would be  
09:11:37 23 connected.

09:11:37 24           So Charter's real issue is that they think that  
09:11:42 25 the applicant made statements in the prosecution history

09:11:45 1 that say you can't have a data bus. But the claim clearly  
09:11:51 2 has a data bus included. The examiner allowed the claim  
09:11:54 3 with a data bus. There's no -- there's no limitation that  
09:11:59 4 says you can't have two circuits connected by a data bus,  
09:12:01 5 and they can't still be separate.

09:12:03 6 THE COURT: Do you agree that a data bus is a  
09:12:05 7 well-established and known term in the relevant art?

09:12:08 8 MS. ALLOR: Yes.

09:12:08 9 THE COURT: Okay.

09:12:08 10 MS. ALLOR: Yes. And both experts have said so.  
09:12:11 11 And Charter doesn't dispute that the data bus is known,  
09:12:14 12 same way that they don't dispute that the circuit is known.

09:12:17 13 Their position really rests on how the claim  
09:12:20 14 language uses those terms and says that based on that  
09:12:24 15 language, it just can't be correct. And we disagree with  
09:12:30 16 that.

09:12:31 17 And if you look again at the definition of  
09:12:34 18 circuit, it's interconnected to perform a particular task,  
09:12:40 19 and the claims make clear what tasks the data networking  
09:12:43 20 engine is doing compared to the cable modem engine.

09:12:46 21 And if you look at Figure 2 again -- oops -- if we  
09:12:53 22 turn to Slide 13, the data -- the data networking engine on  
09:12:57 23 the top is clearly connected by data bus 118 to the cable  
09:13:03 24 modem engine. So there is no disclaimer in the prosecution  
09:13:06 25 history. There is -- there's clear disclosure of the data

09:13:09 1 bus connecting those two engines.

09:13:11 2 And so a POSITA would understand how to set up  
09:13:14 3 those two circuits, they'd understand the functions that  
09:13:17 4 each are supposed to perform. The claim language makes  
09:13:20 5 clear what each should be performing, and so there's really  
09:13:25 6 no issue of indefiniteness here.

09:13:26 7 And if we -- the last couple of slides that I have  
09:13:35 8 here are really just addressing the prior art reference  
09:13:38 9 that Charter is saying it acted as a disclaimer in the  
09:13:42 10 prosecution history. And as our expert has explained, as  
09:13:45 11 we've explained in our briefing --

09:13:46 12 THE COURT: This is the Brooks reference?

09:13:47 13 MS. ALLOR: Yeah, this is the Brooks reference,  
09:13:50 14 exactly.

09:13:50 15 And so as you can see there in the picture, Brooks  
09:13:53 16 had processor 1, processor 2, and had a CMAC. The examiner  
09:14:02 17 mapped processor 1 and processor 2 each to the data  
09:14:05 18 networking engine and the cable modem engine. The problem  
09:14:06 19 was that processor 1 was performing both data networking  
09:14:12 20 functions and cable modem functions.

09:14:13 21 And so what the applicant explained to the  
09:14:16 22 examiner was you can't have separateness when they're  
09:14:19 23 both -- when that -- the one processor is performing both  
09:14:23 24 steps.

09:14:24 25 And so the other issue was that the CMAC was also

09:14:28 1 connected to those two processors, and the CMAC was also  
09:14:31 2 performing cable modem functions. So you couldn't have  
09:14:35 3 this separateness that's in our claims if you had this --  
09:14:38 4 these multiple components all performing the cable modem  
09:14:42 5 functions.

09:14:45 6 THE COURT: Well, my understanding was that during  
09:14:47 7 prosecution, the patentee distinguished Brooks because in  
09:14:52 8 Brooks the available connecting circuitry would be shared  
09:14:56 9 between the processors.

09:14:59 10 Isn't that -- I mean, doesn't that circuitry being  
09:15:03 11 shared, doesn't that really go more to the idea of physical  
09:15:06 12 separateness than it does functional -- or separateness of  
09:15:15 13 functionality?

09:15:15 14 MS. ALLOR: So the applicant explained that they  
09:15:17 15 were sharing components and that they were connected to the  
09:15:18 16 CMAC, but the issue of why it was different from the claims  
09:15:22 17 was really directed to the cable modem functions being  
09:15:28 18 contained in this first processor along with data  
09:15:33 19 networking functions. So it wasn't directed to the  
09:15:35 20 connection, it was directed to the single processor  
09:15:38 21 performing both tasks.

09:15:39 22 THE COURT: All right. Look at -- look at  
09:15:43 23 Claim 18, if you will with me, Counsel. Column 8, Line 24,  
09:15:49 24 the phrase that begins "wherein." I'm sure you're familiar  
09:15:53 25 with this.

09:15:54 1 But it says: "Wherein the cable modem function  
09:15:57 2 performed by the cable modem engine are completely  
09:16:01 3 partitioned from the home networking functions performed by  
09:16:04 4 the data networking engine."

09:16:05 5 Tell me what "completely partitioned" means. I  
09:16:13 6 mean, "partitioned" is one thing, but that extra adjective  
09:16:19 7 "completely" I think can be argued that it's more than one  
09:16:24 8 type of partition, it's all types of partition if it's  
09:16:27 9 completely partitioned. And why wouldn't all types of  
09:16:30 10 partition encompass the kind of physical partition or  
09:16:34 11 separation that the Defendant is arguing for here?

09:16:37 12 MS. ALLOR: So if we look at -- let's go back to  
09:16:41 13 Figure 2 here.

09:16:42 14 Partitioning can happen based on functionality  
09:16:51 15 that was known at the time of the invention that there were  
09:16:53 16 SOCs involved, and you could put all of these functions  
09:16:57 17 into an SOC, and they would be partitioned based on their  
09:17:01 18 functionality. So there wouldn't have to be physical  
09:17:03 19 separateness, but they could all be operating in the same  
09:17:08 20 device.

09:17:08 21 And the same is true today in the actual  
09:17:11 22 embodiments that practice these claims is you can have  
09:17:16 23 multiple circuits in a single device, and they're connected  
09:17:20 24 by a data bus, but that does not make them the same  
09:17:24 25 circuit. That does not make them the same physical device.

09:17:27 1 And so "completely partitioned" simply means that  
09:17:31 2 the functions are partitioned. And the specification  
09:17:33 3 supports that read.

09:17:37 4 If we look at Column -- let me see here -- if we  
09:17:44 5 look at Column 4, Lines 13 to 24, this is describing  
09:17:49 6 functional partitioning, and this is describing exactly  
09:17:51 7 what is -- what is claimed, that the functions are  
09:17:56 8 separate, that they are implemented in separate circuits,  
09:17:59 9 but they are connected by a data bus.

09:18:02 10 And so they operate separately, and they are  
09:18:05 11 partitioned separately. They can be upgraded separately.  
09:18:08 12 Their software can be upgraded without having to affect the  
09:18:13 13 physical hardware.

09:18:14 14 THE COURT: All right. I don't want to finish the  
09:18:20 15 argument on your side without touching on what we  
09:18:23 16 identified as the fourth term from Claim 19, this "DOCSIS  
09:18:28 17 functions."

09:18:29 18 I want to hear what your view is, particularly  
09:18:31 19 with regard to the Defendant's proposed posture. I'm not  
09:18:38 20 sure I've ever seen an argument that Claim 19 is defined by  
09:18:45 21 a lack of change in the scope of Claim 18. I'm not sure  
09:18:51 22 this is not more about Claim 18 than it is about Claim 19,  
09:18:55 23 but the claim term comes from Claim 19.

09:18:57 24 What's your view on this fourth issue?

09:18:59 25 MS. ALLOR: So if we look at Figure 1 again, which

09:19:04 1 I have here on Slide 18, you have three separate components  
09:19:11 2 shown in the cable modem engine. You've got the DOCSIS 2.0  
09:19:16 3 PHY, which is the physical layer, you've got the DOCSIS MAC  
09:19:22 4 processor, which is implemented in the second layer of the  
09:19:23 5 OSI, and then you've got the DOCSIS controller, which is  
09:19:26 6 somewhere above that second layer.

09:19:30 7 In Claim 18, you wouldn't necessarily have to  
09:19:33 8 implement the DOCSIS PHY in the same device as the other  
09:19:40 9 two functions of the cable modem engine. You could have  
09:19:42 10 those DOCSIS 2.0 functions in a separate device.

09:19:48 11 In Claim 19, you are required to have all of those  
09:19:50 12 in one, and so that's where the distinguishing point is, is  
09:19:54 13 that these are three separate phases, separate layers, and  
09:19:59 14 they're all implemented in the same device if you add on  
09:20:04 15 all DOCSIS functions on Claim 19.

09:20:07 16 And so that is where they're ignoring that there's  
09:20:12 17 this option to have other DOCSIS functions performed  
09:20:16 18 outside of the DOCSIS controller and the DOCSIS MAC  
09:20:20 19 processor.

09:20:21 20 THE COURT: So what's your view on the statement  
09:20:24 21 that what this really is in this fourth term is an effort  
09:20:30 22 to get a narrow definition of cable modem engine?

09:20:33 23 MS. ALLOR: By the -- by Charter to get a narrow  
09:20:38 24 definition?

09:20:38 25 THE COURT: Yes.

09:20:39 1 MS. ALLOR: I think that's exactly what they're  
09:20:40 2 trying to do. They're trying to basically read Claim 19  
09:20:45 3 out, say there's no -- there's no need to look at it. I  
09:20:49 4 think that in the end, it really doesn't matter that they  
09:20:52 5 infringe both claims, and so the scope should be different  
09:20:56 6 because of it being a dependent claim and adding additional  
09:21:01 7 limitations. But if you were to find in favor of Charter,  
09:21:04 8 I don't think it impacts infringement.

09:21:06 9 THE COURT: All right. Do you have further  
09:21:08 10 arguments on any of these four -- these first four terms  
09:21:14 11 that we've combined?

09:21:16 12 MS. ALLOR: No. So I'll sit back down, and then  
09:21:18 13 we do have the last term of the '775 after that.

09:21:21 14 THE COURT: All right.

09:21:22 15 MS. ALLOR: Thank you, Your Honor.

09:21:23 16 THE COURT: Let me hear from Charter at this  
09:21:24 17 point.

09:21:24 18 MR. BENYACAR: Good morning, Your Honor.

09:21:44 19 THE COURT: Good morning.

09:21:45 20 MR. BENYACAR: David Benyacar for Charter.

09:21:47 21 THE COURT: Please proceed, Counsel.

09:21:48 22 MR. BENYACAR: Thank you.

09:21:48 23 So while we have no objection to addressing the  
09:21:54 24 claims in the order counsel proposed, we do disagree with  
09:21:59 25 the reasons why they grouped them.



09:22:00 1 The first term, what I refer to as the circuit  
09:22:03 2 limitations, that is not an issue of separateness. That is  
09:22:07 3 not the issue. In fact, the claim says a first circuit and  
09:22:12 4 a second circuit where the second circuit is separate from  
09:22:15 5 the first circuit.

09:22:16 6 So separateness is not some issue we're taking  
09:22:19 7 with this claim. The claim expressly says that the two  
09:22:22 8 circuits have to be separate.

09:22:24 9 THE COURT: Do you believe they have to be on  
09:22:25 10 separate chips, and is there any support for that?

09:22:28 11 MR. BENYACAR: We do not -- we right now do not  
09:22:31 12 take the position that they have to be on separate chips.

09:22:33 13 THE COURT: Okay.

09:22:34 14 MR. BENYACAR: That is not our position.

09:22:36 15 Our position is that -- well, our position is that  
09:22:41 16 the claim has several limitations. There's a data  
09:22:46 17 networking engine and a cable modem engine, which I show in  
09:22:48 18 blue.

09:22:49 19 But that's not the only limitation. The  
09:22:51 20 limitation also requires that that data networking engine  
09:22:54 21 be implemented in a first circuit that includes at least  
09:22:59 22 one processor, that requires more than a cable modem  
09:23:04 23 engine. It requires that the cable modem engine be  
09:23:05 24 implemented in a second circuit that includes at least one  
09:23:09 25 processor where the second circuit is separate from the

09:23:12 1 first circuit.

09:23:12 2 Those are limitations over and above just having a  
09:23:15 3 data networking engine and a cable modem engine.

09:23:17 4 THE COURT: Does that not -- does that not bring  
09:23:20 5 up the issue of separateness, the second circuit being  
09:23:24 6 separate from the first circuit?

09:23:25 7 MR. BENYACAR: Well, our position, Your Honor,  
09:23:26 8 there is -- there is a separateness issue in the claim, but  
09:23:29 9 our position is that there is no way to know even whether  
09:23:33 10 there is a first circuit and a second circuit because --  
09:23:40 11 well, because circuit -- and using the definition that  
09:23:43 12 counsel put up -- depends on the perspective of the viewer,  
09:23:48 13 right?

09:23:48 14 Well, as an initial matter, let me start by saying  
09:23:56 15 a person of skill in the art needs to be able to look at  
09:23:58 16 this claim, look at an accused device and say, okay, do I  
09:24:03 17 not just have a data networking engine and a cable modem  
09:24:06 18 engine, but do I have one in a first circuit, one in a  
09:24:10 19 second circuit and the two circuits are separate, all of  
09:24:13 20 those? And you have the definition of circuit that can  
09:24:15 21 apply to your claim in order to evaluate an accused device.

09:24:19 22 Now, the specification does not provide any  
09:24:21 23 context for this. There's no concept of circuits in the  
09:24:26 24 specification. The word "circuit" is not even used in the  
09:24:29 25 specification. So we can't get any guidance from the

09:24:33 1 specification on what is meant by a first circuit and a  
09:24:36 2 second circuit. What meaning of circuit is being applied  
09:24:40 3 there?

09:24:41 4 Now, what I have on the slide now on Slide 7 is  
09:24:44 5 the same definition that Ms. Allor put up. And there are  
09:24:51 6 two definitions here. And as Your Honor knows, there's no  
09:24:57 7 dispute between the parties that this is -- this is the  
09:25:02 8 plain meaning definition of circuit. Counsel also uses the  
09:25:05 9 same definition.

09:25:06 10 And you can see that the first definition is a  
09:25:09 11 path that can carry electrical current. Now, even --  
09:25:13 12 there's no dispute about this, even transistors, individual  
09:25:17 13 transistors have multiple circuits between them.

09:25:20 14 There's no dispute what I have on Claim 9, using  
09:25:24 15 that definition of circuit, the disclosed data networking  
09:25:28 16 engine and cable modem engines would each include billions  
09:25:31 17 of circuits. So what does that mean?

09:25:34 18 Well, the claim requires that you have a data  
09:25:38 19 networking engine implemented in a first circuit that  
09:25:40 20 includes at least one processor and a second circuit that  
09:25:43 21 includes at least one processor.

09:25:45 22 So according to the claim, you have processors in  
09:25:49 23 circuits. But using that first definition of circuit, you  
09:25:52 24 would not have processors in circuits. You have circuits  
09:25:55 25 in processors. Each processor would be billions of

09:25:59 1 circuits. So using that definition, you wouldn't infringe  
09:26:01 2 Claim 18.

09:26:02 3 So as a result, they don't like that definition  
09:26:05 4 because it wouldn't -- let's assume hypothetically that the  
09:26:11 5 figure -- cable modem 100 that Ms. Allor also showed was an  
09:26:14 6 accused device because we can look at it that way because  
09:26:18 7 there's no concept of circuit in the spec. So let's just  
09:26:21 8 look at that as an example and say, I'm one of skill in the  
09:26:24 9 art. I want to look at figure -- cable modem 100 and say  
09:26:27 10 does that infringe?

09:26:28 11 Well, I would look at this first definition that I  
09:26:30 12 have in red, any path that can carry electrical current,  
09:26:34 13 and I would say, no, it doesn't infringe. I don't have --  
09:26:37 14 I don't have different multiple processors on a circuit. I  
09:26:40 15 have -- every individual processor has billions of  
09:26:43 16 circuits. So there's no infringement.

09:26:48 17 THE COURT: Let me ask you this, you've said at  
09:26:50 18 least twice that there's nothing in the spec here that  
09:26:53 19 addresses this or gives you context. Is your argument on  
09:26:57 20 indefiniteness tied to that, and is it -- is it a flavor of  
09:27:05 21 what I might characterize as a written description issue,  
09:27:08 22 or is your argument unrelated to the fact that you say  
09:27:12 23 there's a lack of support in the specification?

09:27:14 24 MR. BENYACAR: So there is a written description  
09:27:17 25 issue, but my argument is not -- is not directly tied to

09:27:21 1 that. My argument is if the specification had provided  
09:27:25 2 some context or explanation of which of the many different  
09:27:28 3 definitions of circuit to employ, the result here might be  
09:27:32 4 different. We may be able to look at the specification and  
09:27:35 5 see what's meant.

09:27:35 6 But the specification is silent. So we're stuck  
09:27:38 7 with the plain meaning of circuit. And according to the  
09:27:41 8 plain meaning of circuit, an individual path can be a  
09:27:44 9 circuit.

09:27:44 10 Now -- so they don't like Definition 1 because it  
09:27:48 11 would result -- it would mean cable modem 100 does not  
09:27:51 12 infringe.

09:27:51 13 So they look to Definition No. 2, and Definition  
09:27:56 14 No. 2 is what constitutes a circuit depends on the level at  
09:28:00 15 which you want to consider. In other words, according to  
09:28:04 16 the definition itself, what constitutes a circuit depends,  
09:28:07 17 depends on how you want to look at it. You can look at it  
09:28:10 18 at any level.

09:28:11 19 This is the very definition that Ms. Allor showed,  
09:28:15 20 okay? Definition No. 2 says: At one level, a computer  
09:28:20 21 consists of a single circuit; at another it consists of  
09:28:26 22 hundreds of interconnected circuits. It all depends on how  
09:28:29 23 you want to look at it.

09:28:30 24 So let's --

09:28:32 25 THE COURT: So is the argument -- I'm trying to

09:28:36 1 follow where you're headed and try to guess where you're  
09:28:39 2 going in the future here.

09:28:40 3 But, I mean, are you really telling me that a  
09:28:42 4 POSITA would not know what a circuit is because there's no  
09:28:44 5 definition of circuit in the specification?

09:28:46 6 MR. BENYACAR: No, Your Honor.

09:28:48 7 THE COURT: Okay.

09:28:48 8 MR. BENYACAR: Absolutely not.

09:28:49 9 There -- we agree that what's shown on the -- the  
09:28:54 10 definition that's shown on the screen and the definition  
09:28:56 11 that Ms. Allor showed is a plain meaning definition of  
09:29:00 12 circuit that everyone of skill in the art would understand.

09:29:02 13 THE COURT: All right.

09:29:03 14 MR. BENYACAR: My argument is that what  
09:29:06 15 constitutes a circuit depends. The definition says it.  
09:29:12 16 Let's -- the very definition Ms. Allor showed says: At one  
09:29:17 17 level, a computer consists of a single circuit; at another,  
09:29:22 18 it consists of hundreds of interconnected circuits.

09:29:25 19 That's the plain meaning definition. The plain  
09:29:28 20 meaning definition of circuit is it depends.

09:29:32 21 There's another definition, which Ms. Allor  
09:29:33 22 showed, which is any path that can carry electrical  
09:29:36 23 current, but they don't like that one because that would  
09:29:39 24 result in no infringement. So I'm just focusing on No. 2  
09:29:42 25 now.

09:29:42 1 So let's take the first -- what I have highlighted  
09:29:44 2 in yellow. At one level, a computer consists of a single  
09:29:48 3 circuit. So let's say that I'm someone skilled in the art,  
09:29:53 4 and I want to make cable modem 100, and I want to know,  
09:29:56 5 well, do I satisfy the limitation of two separate circuits?

09:29:59 6 I can look at that and say, well, no. At one  
09:30:02 7 level, a computer consists of a single circuit, so my whole  
09:30:05 8 cable modem is only one circuit. I don't infringe because  
09:30:10 9 I don't have two separate circuits. I don't have two  
09:30:13 10 circuits at all. It's one circuit.

09:30:14 11 So under this definition of circuit where the  
09:30:21 12 entire computerized device is a single circuit, I don't  
09:30:24 13 have a data networking engine implemented in a first  
09:30:27 14 circuit and a cable modem engine implemented in a second  
09:30:31 15 circuit. It's all in one circuit.

09:30:33 16 So cable modem 100, if I was making that, would  
09:30:39 17 not infringe because it's one circuit.

09:30:41 18 And this is an important point because under  
09:30:45 19 Entropic's own reading of the specification, it's one  
09:30:48 20 circuit. How do I know that? Because this is in their  
09:30:51 21 brief. This is in their opening brief at Page 8.

09:30:55 22 They contend that cable modem 100 is all on what's  
09:30:58 23 called the system on chip. That's their position. They  
09:31:01 24 say -- if you look at the bottom, they say that's what the  
09:31:06 25 '775 discusses, a chip implementing cable modem system 100.

09:31:09 1 The overall system including both engines. This is their  
09:31:13 2 position. The whole thing is a system on chip.

09:31:17 3 So what's the plain meaning of a system on chip?  
09:31:22 4 This is -- this is a plain meaning definition of system on  
09:31:27 5 chip from a dictionary. System on chip, a silicon  
09:31:31 6 integrated circuit. It's one circuit. So if they're right  
09:31:35 7 and it's a system on chip, then I'm someone skilled in the  
09:31:38 8 art. I'm going, well, what's a -- I have a system on chip.  
09:31:41 9 What is it? I look at this, and I say, oh, it's one  
09:31:44 10 circuit. I don't infringe.

09:31:44 11 So yet the gist of their argument is that they're  
09:31:59 12 allowed to -- because the definition says -- Definition  
09:32:03 13 No. 2 says, it's a combination of electrical components to  
09:32:06 14 perform the function, their basic argument is, well, we can  
09:32:09 15 combine whatever we want. Like, we don't have to take  
09:32:12 16 those definitions. Whatever combination suits me when I'm  
09:32:17 17 accusing a device, that's what I'll pick, and that'll be a  
09:32:20 18 circuit.

09:32:21 19 So another way to read the definition is the data  
09:32:25 20 networking engine, the DOCSIS controller, and the DOCSIS  
09:32:27 21 MAC processor could all be separate circuits. They don't  
09:32:30 22 perform functions. They don't like that way to read it  
09:32:34 23 because you wouldn't have the cable modem engine on a  
09:32:37 24 second circuit.

09:32:38 25 So the law here is that if there are multiple ways



09:32:45 1 to read a claim that result in different claim scope, the  
09:32:50 2 claim is indefinite.

09:32:52 3 This is the -- this case is the sine qua non of  
09:32:55 4 that because the very definition of circuit says it depends  
09:32:59 5 on how you look at it, and the specification provides us no  
09:33:02 6 guidance.

09:33:03 7 So let me provide one final example of their -- of  
09:33:08 8 the way they would read this.

09:33:10 9 Let's make believe that Entropic had a claim that  
09:33:15 10 was the exact opposite for Claim 18. Let's make believe.  
09:33:18 11 And rather than say the cable modem engine and the data  
09:33:21 12 networking engine are implemented in two separate circuits,  
09:33:24 13 this opposite claim says they're both implemented in the  
09:33:28 14 same single circuit.

09:33:29 15 Well, Entropic would then say, oh, okay. Well,  
09:33:34 16 that same cable modem with engine 100, it infringes that  
09:33:37 17 claim, too, because, see, the definition says the entire  
09:33:40 18 computer can be one circuit. The entire computer is  
09:33:42 19 something that performs functions. So cable modem 100  
09:33:45 20 would infringe that opposite claim as well. That can't be.

09:33:53 21 Circuit -- the very definition of circuit is it  
09:33:55 22 depends on how you look at it. The entire computer can be  
09:33:59 23 a circuit and the individual component can be a circuit and  
09:34:01 24 any place in between, and which one you pick changes the  
09:34:04 25 claim scope. So the claim is indefinite.

09:34:09 1 THE COURT: All right.

09:34:09 2 MR. BENYACAR: All right. So, I'm sorry, I just  
09:34:11 3 have to go over here and move this slide.

09:34:23 4 THE COURT: You're free to put Mr. Dacus to work  
09:34:26 5 any way you'd like to.

09:34:29 6 MR. BENYACAR: Thank you, Your Honor.

09:34:29 7 MR. DACUS: He's witnessed my technological  
09:34:31 8 skills, Your Honor. That's why he walked over here.

09:34:36 9 MR. BENYACAR: So what Your Honor said about  
09:34:41 10 completely partitioned is exactly what happened during  
09:34:46 11 prosecution.

09:34:46 12 The applicants argued -- and these are the same  
09:34:48 13 components Ms. Allor showed being highlighted. The  
09:34:51 14 applicant said that sharing means there's no complete  
09:34:56 15 partition. And the applicant pointed to this -- said that  
09:35:01 16 because connecting circuitry would be shared, there's no  
09:35:04 17 complete partitioning. That's what the applicant said.

09:35:07 18 The language that I have highlighted in green  
09:35:18 19 here, Your Honor, is the complete partitioning language in  
09:35:21 20 the claim. So it's the very claim language that the  
09:35:23 21 applicant was participate -- was partitioning. You see, it  
09:35:27 22 says that because the processors share the same data paths,  
09:35:34 23 system bus 108 and ASB 210, there's no complete  
09:35:37 24 partitioning.

09:35:38 25 And there's no dispute that ASB 210 is -- is a

09:35:44 1 data bus. There's no dispute.

09:35:50 2 This is from Entropic's expert, Dr. Kramer. It  
09:35:53 3 says: Processors 102 and 104 are connected directly by  
09:35:57 4 system bus 108, also known as the advanced system bus 210.  
09:36:03 5 There's no dispute that what I've highlighted in there,  
09:36:03 6 what was distinguished by the applicant, was the existence  
09:36:05 7 of a data bus.

09:36:06 8 And in addition, not only the connected circuitry  
09:36:13 9 was distinguished, the applicant also said, oh, those --  
09:36:16 10 that cable modem engine and data processing engine (sic),  
09:36:19 11 they also share a memory device.

09:36:21 12 And I have that highlighted here on Page 45. You  
09:36:26 13 see I have that highlighted.

09:36:28 14 Sharing the same direct memory access controls --  
09:36:28 15 THE COURT: Could you slow down a little bit,  
09:36:30 16 please?

09:36:30 17 MR. BENYACAR: I apologize, Your Honor.

09:36:31 18 THE COURT: Thank you.

09:36:31 19 MR. BENYACAR: So we have the sharing of the  
09:36:40 20 connecting circuitry, the sharing of the data bus, and on  
09:36:47 21 Slide 45, the sharing of the direct memory access  
09:36:50 22 controller.

09:36:51 23 And the applicant distinguished the very claim  
09:37:00 24 language, the very completely partitioned claim language in  
09:37:02 25 our claim here on the basis that there was shared

09:37:06 1 connecting circuitry, shared data bus, and shared memory.

09:37:08 2 And so that's how we construe the completely  
09:37:14 3 partitioned limitation, exactly that way, and that's why  
09:37:18 4 data bus is indefinite.

09:37:21 5 It's not because, as Ms. Allor seemed to suggest,  
09:37:25 6 that we don't know that the claim calls for a data bus. Of  
09:37:28 7 course, we know that. But the applicants distinguished the  
09:37:32 8 prior art on the grounds that there was a data bus  
09:37:34 9 connecting them.

09:37:36 10 THE COURT: All right. Let me have your targeted  
09:37:39 11 argument on this fourth claim, the DOCSIS functions.

09:37:45 12 MR. BENYACAR: Yes, Your Honor.

09:37:45 13 THE COURT: The interplay between Claims 18 and  
09:37:49 14 19.

09:37:49 15 MR. BENYACAR: Yes. I apologize, it takes me a  
09:37:54 16 minute to get there.

09:37:55 17 Okay. On the left is Claim 19. It says: All  
09:38:06 18 DOCSIS functions are localized in the cable modem engine.  
09:38:11 19 Okay. So now we have not argued that cable modem engine  
09:38:15 20 and data networking engine are indefinite because we  
09:38:17 21 thought in view of the spec we understood what they meant.

09:38:21 22 A cable modem engine is what performs the cable  
09:38:23 23 modem functions, and the data networking engine is what  
09:38:24 24 performs the data networking functions. So we didn't think  
09:38:28 25 they were indefinite.

09:38:29 1 But DOCSIS is indisputably a cable modem function.

09:38:35 2 What I have on the Slide 47 on the right is an  
09:38:38 3 excerpt from Dr. Kramer's report, Entropic's expert, where  
09:38:42 4 he says: Cable modem functions, e.g., DOCSIS. So there's  
09:38:47 5 no dispute that DOCSIS is a cable modem function.

09:38:51 6 Claim 19 says: All DOCSIS functions are localized  
09:38:54 7 in the cable modem engine.

09:38:55 8 Now, Your Honor said something to Ms. Allor, which  
09:38:57 9 I agree with, you said, is this really more an issue of  
09:39:00 10 Claim 18? In some way it is because if this can be true  
09:39:06 11 that all DOCSIS functions are not localized in a cable  
09:39:09 12 modem engine, then cable modem engine is indefinite.

09:39:11 13 Let's look at what the specification says about  
09:39:14 14 the cable modem engine.

09:39:16 15 Sorry, Your Honor. Let's just do it this way. I  
09:39:46 16 apologize.

09:40:01 17 The specification says that there's a cable modem  
09:40:04 18 system architecture with a cable modem engine that performs  
09:40:07 19 all cable modem functions. That's what we thought a cable  
09:40:14 20 modem engine was.

09:40:15 21 It further says: DOCSIS and VoIP functionality is  
09:40:18 22 implemented in the cable modem engine because DOCSIS is a  
09:40:21 23 cable modem function.

09:40:22 24 The bottom quote also says: Cable modem engine  
09:40:25 25 implements the entire DOCSIS cable modem functionality,

09:40:28 1 because DOCSIS is a cable modem function.

09:40:30 2 So the whole point -- and this is on Slide 49 --  
09:40:37 3 of having a cable modem engine and a data networking engine  
09:40:41 4 is to make sure that the cable modem functions are  
09:40:47 5 partitioned from the data networking functions.

09:40:50 6 So in the quote at the top, data and home  
09:40:53 7 networking functionality is provided by a data networking  
09:40:55 8 engine and DOCSIS and VoIP functionality is provided by a  
09:40:58 9 cable modem engine. And the point of that is to make sure  
09:41:01 10 that home networking functionality is completely decoupled  
09:41:05 11 from the DOCSIS functionality.

09:41:06 12 So I would respectfully suggest that in Claim 19,  
09:41:13 13 if it means what Ms. Allor says it means, which is why you  
09:41:17 14 can have a cable modem function, but it doesn't have to  
09:41:20 15 perform all DOCSIS functionality, then cable modem engine  
09:41:22 16 is indefinite. Because if it's not something that performs  
09:41:25 17 all the cable modem functionality, there's no way to know  
09:41:29 18 what it means.

09:41:33 19 THE COURT: All right.

09:41:33 20 MR. BENYACAR: Thank you, Your Honor.

09:41:35 21 THE COURT: Let me see if the Plaintiff has any  
09:41:41 22 brief follow-up.

09:41:43 23 MS. ALLOR: So I want to turn to the ELMO and put  
09:42:09 24 up -- oops, sorry about that.

09:42:12 25 So this is Slide 43 of Charter's presentation, and

09:42:17 1 this is with regards to the completely partitioned  
09:42:22 2 discussion.

09:42:23 3 And when they -- our reply brief really outlines,  
09:42:26 4 you know, our issues with Brooks and how the applicant  
09:42:30 5 distinguished over it.

09:42:31 6 But I just want to point to what they had up on  
09:42:33 7 the slide and show you that the applicant specifically was  
09:42:38 8 addressing the cable modem functions being completely  
09:42:42 9 partitioned.

09:42:42 10 So if you see that right here, completely  
09:42:45 11 partitioned, and you have functions.

09:42:48 12 So they weren't discussing the physical  
09:42:51 13 partitioning. They were discussing the functions being  
09:42:55 14 partitioned.

09:42:56 15 And I think we just want to keep going back to  
09:42:57 16 that and say, you know, there's no disclaimer in the file  
09:43:01 17 history. The use of the data bus does not change the claim  
09:43:04 18 language. It does not mean you can't have the cable modem  
09:43:08 19 engine and the data networking engine be partitioned from  
09:43:10 20 one another.

09:43:11 21 And our reply brief, it's at Pages 2 to 3, is  
09:43:18 22 where we, you know, reiterate this argument, and I think  
09:43:21 23 we've really made it clear.

09:43:23 24 So going back to one of the definitions that  
09:43:26 25 counsel put up numerous times -- if you go to our slides.

09:43:35 1 So the circuit definition, you heard Charter  
09:43:44 2 explain that if we go with the first definition, that you  
09:43:48 3 wouldn't have any idea how to define the circuit. Any path  
09:43:50 4 that can carry electrical current, that it would cover the  
09:43:55 5 cable modem engine and the data networking engine  
09:43:56 6 implemented in a single SOC.

09:43:58 7 But they're ignoring that an SOC can have multiple  
09:44:05 8 processors on it, and the claims require at least two  
09:44:08 9 processors, at least one for the cable modem engine and at  
09:44:10 10 least one for the data networking engine.

09:44:11 11 So the context of the definition of circuit is  
09:44:13 12 what's important for these terms. And any path that can  
09:44:18 13 carry electrical current, that is not what's being  
09:44:20 14 described in the patent. It's discussing the particular  
09:44:23 15 tasks being implemented in two separate engines that are  
09:44:28 16 separate from one another.

09:44:29 17 And so that is why the definition of circuit would  
09:44:32 18 be clearly understood by a POSITA, and they would have no  
09:44:35 19 trouble understanding the boundaries of the claims.

09:44:39 20 And then with respect to Claim 19, I just want to  
09:44:48 21 go back to that one last time.

09:44:52 22 What Charter is really trying to do is limit Claim  
09:44:57 23 18, and you heard Mr. Benyacar admit that, that they really  
09:45:00 24 want Claim 18 limited to all DOCSIS functions. And the  
09:45:04 25 specification doesn't say that.



09:45:05 1 The specification has other functions that are not  
09:45:09 2 required by Claim 18 that could be implemented in Claim 19.  
09:45:14 3 And that's claim differentiation. You know, that's a, you  
09:45:19 4 know, clear issue when you're looking at the two claims.  
09:45:24 5 And so we would disagree with his read that all DOCSIS  
09:45:26 6 functions are required by Claim 18.

09:45:29 7 THE COURT: Counsel for Charter tells me that  
09:45:33 8 there's just no help in the specification at all. It  
09:45:36 9 doesn't provide any context, doesn't give you any guidance.  
09:45:43 10 I would gather and assume that you don't agree with that,  
09:45:47 11 but I'd like to hear your view on that.

09:45:49 12 MS. ALLOR: I don't. And I'll show you in the  
09:45:53 13 specification -- if we could just go to the '775 patent.  
09:46:08 14 And if you go to Column 3.

09:46:10 15 And this is what Charter's relying on for the next  
09:46:13 16 two terms are this portion of Column 3. So at the bottom  
09:46:18 17 is what I'm going to focus on. And it's describing --

09:46:23 18 THE COURT: Which line number?

09:46:41 19 MS. ALLOR: Sorry.

09:46:46 20 So it's actually at the top of Column 3.

09:46:48 21 And so the DOCSIS PHY 112, if you see it here at  
09:46:54 22 Line 9 and Column 3, that's referring to the DOCSIS  
09:46:58 23 physical layer, and that is something separate and distinct  
09:47:03 24 from the DOCSIS MAC processor.

09:47:04 25 The DOCSIS MAC processor is performing MAC

09:47:08 1 functions, and the DOCSIS PHY layer is -- as you can see  
09:47:13 2 here, exchanges voice data.

09:47:15 3 And so those two are separate, and they can be  
09:47:19 4 implemented in a single cable modem engine, or you could  
09:47:25 5 have that DOCSIS PHY -- DOCSIS 2.0 PHY in a separate  
09:47:31 6 component.

09:47:32 7 And so I think that's where they're trying to read  
09:47:35 8 Claim 18 as requiring the DOCSIS physical layer functions  
09:47:39 9 as part of the cable modem engine. And that is not part of  
09:47:44 10 the claims. It could be, but it's not limited to that.  
09:47:47 11 And that's why Claim 19 says all DOCSIS functions. So it  
09:47:52 12 includes the physical layer functions.

09:47:56 13 THE COURT: All right. What else?

09:47:57 14 MS. ALLOR: That's all I had for those rebuttal  
09:48:00 15 terms.

09:48:01 16 If you want to -- if you'd like to move on to the  
09:48:04 17 next two terms, Your Honor, "DOCSIS MAC processor" and  
09:48:10 18 "DOCSIS controller."

09:48:10 19 And that starts at Slide --

09:48:15 20 THE COURT: I would like to do those next, but  
09:48:17 21 since you're only proposing plain and ordinary meaning and  
09:48:20 22 the Defendants offered a specific construction,  
09:48:24 23 alternatively arguing it's indefinite, I'd like to hear  
09:48:26 24 from the Defendant on these first.

09:48:27 25 MS. ALLOR: Okay. That'll be great. Thank you.

09:48:34 1 THE COURT: I reserve the right to set the order.

09:48:36 2 MS. ALLOR: Of course. Of course.

09:48:37 3 THE COURT: All right. Let me hear from Charter  
09:48:39 4 on "DOCSIS MAC processor" and "DOCSIS controller."

09:48:42 5 MR. BENYACAR: Thank you, Your Honor.

09:48:56 6 To begin, DOCSIS MAC processor and DOCSIS  
09:49:00 7 controller do not have plain and ordinary meanings. No  
09:49:01 8 party has pointed to a dictionary to say that these are  
09:49:05 9 well-known terms in the art. They are not.

09:49:07 10 So Entropic takes a very simple view of how to  
09:49:14 11 construe these. They say, and this is in their brief,  
09:49:17 12 well, the DOCSIS MAC processor is just the device that does  
09:49:22 13 DOCSIS MAC processing. And a DOCSIS controller is just the  
09:49:25 14 device that controls DOCSIS functions. This is on Page 14  
09:49:29 15 of their opening brief.

09:49:30 16 And as we say in our brief, that's simplistic but  
09:49:34 17 incorrect because it would not serve to distinguish a  
09:49:38 18 DOCSIS MAC processor from a DOCSIS controller.

09:49:41 19 And the reason for that is in the specification,  
09:49:44 20 the DOCSIS controller, the only DOCSIS controller  
09:49:48 21 disclosed, also performs DOCSIS MAC functions. And the  
09:49:52 22 disclosed DOCSIS MAC processor also controls DOCSIS  
09:49:57 23 functions.

09:49:57 24 So they would be indistinguishable under  
09:50:01 25 Entropic's plain meaning construction.

09:50:04 1 What I have on the slide now, on Slide 31, is the  
09:50:10 2 specification's description of the functions that the  
09:50:14 3 DOCSIS controller performs. It's a lot.

09:50:17 4 But among those are numerous DOCSIS MAC functions.  
09:50:25 5 DOCSIS MAC management message processing, MAC address  
09:50:31 6 learning, voice MAC driver. This is undisputed. This is  
09:50:34 7 in Dr. Almeroth's report, and it's undisputed by  
09:50:37 8 Dr. Kramer, that the disclosed controller performs DOCSIS  
09:50:43 9 MAC functions. Therefore, under Entropic's plain meaning,  
09:50:46 10 the DOCSIS controller is also a DOCSIS MAC processor  
09:50:48 11 because it performs DOCSIS MAC functions.

09:50:50 12 Similarly, the DOCSIS MAC processor controls  
09:50:59 13 DOCSIS functions. It controls the DOCSIS MAC functions  
09:51:03 14 that it performs. Therefore, the DOCSIS MAC processor  
09:51:09 15 disclosed in the specification is also a DOCSIS controller.

09:51:15 16 The DOCSIS controller -- the disclosed DOCSIS  
09:51:19 17 controller performs DOCSIS MAC functions, and the disclosed  
09:51:24 18 DOCSIS MAC processor performs DOCSIS functions, and so,  
09:51:28 19 therefore, there would be no way to distinguish between  
09:51:31 20 them according to Entropic's plain meaning.

09:51:35 21 THE COURT: So are you telling me that DOCSIS  
09:51:37 22 doesn't have a plain meaning known in the art, and MAC  
09:51:41 23 doesn't have a plain meaning known in the art?

09:51:43 24 MR. BENYACAR: No, they do. They absolutely do.

09:51:45 25 But there's a device in the spec called a DOCSIS

09:51:50 1 controller.

09:51:50 2           The word "DOCSIS" has a plain meaning in the art,  
09:51:53 3 and the word "controller" has a plain meaning in the art.  
09:51:59 4 But those plain meanings don't exclude the DOCSIS  
09:52:04 5 controller from performing DOCSIS MAC functions, and, in  
09:52:06 6 fact, in the specification, they do. The DOCSIS controller  
09:52:10 7 performs DOCSIS MAC functions.

09:52:13 8           So let me go back a couple of slides.

09:52:18 9           If Entropic was right that what a DOCSIS MAC  
09:52:22 10 processor is, is a device that performs DOCSIS MAC  
09:52:26 11 functions, then the disclosed DOCSIS controller is a  
09:52:31 12 DOCSIS MAC processor because it performs DOCSIS MAC  
09:52:34 13 functions.

09:52:45 14           If Entropic was right that a DOCSIS MAC processor  
09:52:52 15 performs DOCSIS MAC functions, then it's also a DOCSIS  
09:52:56 16 controller because it controls the DOCSIS functions it  
09:52:59 17 performs. There would be no way to distinguish between the  
09:53:02 18 two.

09:53:03 19           Now, ordinarily, you might say, okay, well,  
09:53:08 20 there's no -- you know, what difference does it make?  
09:53:09 21 Right? So the DOCSIS controller is also a DOCSIS MAC  
09:53:11 22 processor, and the DOCSIS MAC processor is also a DOCSIS  
09:53:13 23 controller. So what.

09:53:13 24           But the reason why that's important is twofold.  
09:53:19 25 One is, of course, the claim calls them out separately.

09:53:22 1 You should be able to know the way to tell the difference.

09:53:25 2 But more importantly, the claim requires what the  
09:53:31 3 specification describes as the DOCSIS controller bypass  
09:53:35 4 limitation. Downstream data has to be sent from the DOCSIS  
09:53:40 5 MAC processor to the data networking engine -- this is in  
09:53:45 6 blue, and you see the excerpt from the spec -- without  
09:53:50 7 involving controller 116.

09:53:52 8 And this is claimed. So this is Claim 18. The  
09:53:57 9 DOCSIS MAC processor forwards packets to the data  
09:54:01 10 networking engine without the involvement of the DOCSIS  
09:54:05 11 controller.

09:54:06 12 Well, according to Entropic's plain meaning, if a  
09:54:11 13 DOCSIS MAC processor is a DOCSIS controller and a DOCSIS  
09:54:15 14 controller is a DOCSIS MAC processor, then that limitation  
09:54:18 15 would be impossible to perform.

09:54:19 16 So the claim would be indefinite. But we're not  
09:54:28 17 saying it's indefinite. We're saying you can distinguish  
09:54:31 18 the two. They're not phrases that have plain meanings.

09:54:37 19 But you can look at the spec and say, oh, okay. I  
09:54:40 20 see what it is. You're saying the DOCSIS controller is  
09:54:42 21 what performs the functions that you said in the spec. And  
09:54:46 22 you're saying the DOCSIS MAC processor is the thing that  
09:54:48 23 performs the functions in the spec.

09:54:49 24 So, okay, if that's the definition I'm going to  
09:54:52 25 use, then I know what they are, and then I can -- I can

09:54:56 1 perform a function without the involvement of the DOCSIS  
09:55:00 2 controller.

09:55:00 3 THE COURT: It seems like to me, Counsel, that  
09:55:02 4 we're coming back to this theme that what's in the claim is  
09:55:06 5 not compatible with what's in the spec, and, therefore, the  
09:55:09 6 claim language is indefinite, which, again, may be a very  
09:55:14 7 good motion for summary judgment on inadequate description,  
09:55:18 8 but I don't know how it applies to the claim construction  
09:55:21 9 function.

09:55:22 10 MR. BENYACAR: So this is -- this absolutely, Your  
09:55:27 11 Honor, is not an issue of it not being described in the  
09:55:29 12 spec. If the spec --

09:55:29 13 THE COURT: It just continues to feel like it when  
09:55:32 14 I hear you argue.

09:55:33 15 MR. BENYACAR: So then I'm saying it wrong,  
09:55:35 16 because the specification absolutely describes the DOCSIS  
09:55:37 17 controller, and it absolutely describes a DOCSIS MAC  
09:55:40 18 processor. We're not saying that it doesn't.

09:55:43 19 THE COURT: Okay.

09:55:43 20 MR. BENYACAR: We're saying that what Entropic  
09:55:47 21 wants is for the construction of those terms to be broader  
09:55:51 22 than what's in the spec. They don't say, well, yeah, okay.  
09:55:56 23 The spec says what a DOCSIS controller is. So that's what  
09:55:58 24 it is. They don't want that.

09:56:00 25 They say DOCSIS controller is anything that

09:56:05 1 controls DOCSIS functions. And there's a DOCSIS MAC  
09:56:09 2 processor disclosed in the spec in great detail. We're not  
09:56:12 3 saying there's not. And we say and that's what it is.

09:56:15 4 And Entropic says, oh, no, it's broader than that.  
09:56:18 5 A DOCSIS MAC processor is something that performs DOCSIS  
09:56:22 6 MAC functions.

09:56:24 7 Well, if that's the argument you're going to use,  
09:56:27 8 then there's no distinction between a DOCSIS MAC processor  
09:56:30 9 and a DOCSIS controller. Our argument is not the spec does  
09:56:34 10 not disclose it. It does. Our argument is that Entropic's  
09:56:37 11 reading of it is so broad that it makes the two terms  
09:56:42 12 indistinguishable.

09:56:43 13 THE COURT: Well, this is not the first time I've  
09:56:46 14 heard defense counsel say Plaintiff wants an overly broad  
09:56:50 15 reading of the disputed terms. And believe it or not, I've  
09:56:54 16 heard Plaintiff's counsel say Defendant wants an overly  
09:56:56 17 narrow reading of the claim language.

09:56:58 18 And that's part of why I'm up here. The truth is  
09:57:03 19 usually somewhere in between.

09:57:06 20 I hear your argument. And, you know, the second  
09:57:13 21 half of your argument is the language is not as broad as  
09:57:16 22 the Plaintiff wants. It's narrower like we want, or it's  
09:57:20 23 necessarily indefinite.

09:57:22 24 MR. BENYACAR: Because there's no way to perform  
09:57:23 25 the claimed -- not indefinite because just you don't know



09:57:27 1 what it is. It's indefinite because you can't perform a  
09:57:30 2 claimed limitation. You can't perform the step of doing  
09:57:33 3 anything without the involvement of a DOCSIS controller  
09:57:36 4 because the disclosed DOCSIS MAC processor is a DOCSIS  
09:57:40 5 controller by their definition. And so it would be  
09:57:44 6 impossible for any DOCSIS MAC processor to do anything  
09:57:47 7 without the involvement of the DOCSIS controller.

09:57:48 8 So I just want to be clear, this is not one of  
09:57:51 9 those cases where we're saying, oh, they're reading it  
09:57:54 10 overly broad just -- and for just that reason, it's  
09:57:56 11 indefinite.

09:57:57 12 We're saying if you use their broad definition,  
09:57:59 13 there's no way to perform the claim limitation of a DOCSIS  
09:58:04 14 MAC processor doing something without a DOCSIS controller  
09:58:06 15 because they're both the same thing.

09:58:09 16 THE COURT: All right. Anything else on these?

09:58:12 17 MR. BENYACAR: No, Your Honor. Just that, again,  
09:58:23 18 our construction is not that it's indefinite. You can save  
09:58:29 19 the claim and allow the performance of the -- of the --  
09:58:32 20 without the involvement of the DOCSIS controller limitation  
09:58:35 21 if you construe the terms consistent with what the  
09:58:39 22 specification says, and then you know what they are.

09:58:42 23 THE COURT: All right.

09:58:42 24 MR. BENYACAR: Thank you, Your Honor.

09:58:43 25 THE COURT: Thank you, Counsel.

09:58:45 1 Let me hear from the Plaintiff in response.

09:58:46 2 MS. ALLOR: Thank you, Your Honor.

09:58:54 3 And I think, you know, the point that you just  
09:58:57 4 made that, you know, Defense is asking for, you know, you  
09:59:02 5 to look at the specification and construe it exactly as is  
09:59:06 6 in there and that is too narrow, that is the main issue, is  
09:59:11 7 if you look at the specification, it clearly describes what  
09:59:15 8 DOCSIS did at the time and what the MAC processor did and  
09:59:19 9 what the controller did.

09:59:22 10 And if we turn here to Slide 20, it --

09:59:25 11 THE COURT: In essence, you're telling me that if  
09:59:27 12 I construe it as spelled out in the specification, then  
09:59:31 13 that is to a large extent importing a limitation here  
09:59:36 14 that's not proper?

09:59:38 15 MS. ALLOR: It is. And it's letting the Defendant  
09:59:42 16 have a means-plus-function construction without actually  
09:59:46 17 going through the steps and showing that it should be  
09:59:50 18 proper.

09:59:50 19 And if we look at the specification, I'm going to  
09:59:53 20 jump ahead to the two portions that they are relying on  
09:59:56 21 here.

09:59:58 22 On the right is what they're pointing to for  
10:00:03 23 the DOCSIS MAC processor. And the first sentence says: A  
10:00:06 24 processor 114 implements realtime critical MAC functions  
10:00:10 25 for both upstream and downstream communications.

10:00:13 1 The realtime aspect is actually in a dependent  
10:00:16 2 claim. So there is the first issue we see is that this  
10:00:20 3 specification is broader than what is required and -- or,  
10:00:29 4 sorry, it's limiting what's required. So the Claim 18 is  
10:00:32 5 broader. It's directed to generally the DOCSIS MAC  
10:00:36 6 functions.

10:00:39 7 And if you were to look at what DOCSIS functions  
10:00:42 8 did at the time of invention compared to what they do now,  
10:00:46 9 they've changed a little bit over time. There may be  
10:00:49 10 things that are included that are not included now. Or  
10:00:52 11 there might be things that were excluded then that are now  
10:00:52 12 included.

10:00:53 13 And the same thing with respect to the DOCSIS  
10:00:55 14 controller. If you look at the second passage on the right  
10:00:58 15 side, the controller implements certain DOCSIS blocks.

10:01:04 16 And one of the things that Mr. Benyacar pointed  
10:01:07 17 out was that they're the same. But they're not the same  
10:01:10 18 because the things that he's pointing to as the MAC  
10:01:12 19 functions that he's saying the controller is doing, they're  
10:01:14 20 not MAC functions. They're actually controller functions  
10:01:18 21 of the MAC.

10:01:19 22 And so take MAC management message, that is  
10:01:25 23 managing the messages coming from the MAC. It's not  
10:01:28 24 performing MAC functions. It's managing the messages.

10:01:31 25 MAC address learning is one of the other things he

10:01:33 1 pointed to. Your MAC processor has an address. Whether  
10:01:37 2 it's a DOCSIS MAC processor or just a MAC processor, it has  
10:01:40 3 an address that is known. And the MAC --

10:01:44 4 THE COURT: You lost me there. Too many MACs.  
10:01:49 5 It's --

10:01:49 6 MS. ALLOR: Sorry.

10:01:50 7 THE COURT: -- it's coming from the MAC, but it's  
10:01:51 8 not a MAC function?

10:01:52 9 MS. ALLOR: Right. So the DOCSIS controller is  
10:01:54 10 controlling the MAC. It's taking the messages, it's taking  
10:01:58 11 the MAC address, and it's learning those, but it's not  
10:02:02 12 implementing MAC functions.

10:02:03 13 And so those two are separate devices, separate  
10:02:07 14 implementations. One is in the -- or, sorry, one is in  
10:02:12 15 layer 2.

10:02:12 16 So if we go back a slide, this is the OSI model  
10:02:17 17 that communications are set up in.

10:02:19 18 And we've got the physical layer, which we talked  
10:02:23 19 about earlier that the DOCSIS PHY is implemented in. And  
10:02:29 20 then we've got the DOCSIS MAC processor. The MAC processor  
10:02:29 21 is implemented in layer 2.

10:02:31 22 And then everything above that interacts with the  
10:02:33 23 MAC processor. And so that's where the DOCSIS controller  
10:02:35 24 is implemented is in this layer 3 or layer 4 or between  
10:02:40 25 layer 2 and layer 3. And it's controlling the MAC

10:02:45 1 processor. But they're not the same.

10:02:46 2 And the specification explains the differences.

10:02:48 3 It shows how they are defined at the time, and it shows in  
10:02:53 4 the claim language what functions those -- each are  
10:02:57 5 supposed to be performing.

10:02:58 6 But if we were to limit it to what's in the  
10:03:01 7 specification, you would be excluding what is claimed by --  
10:03:08 8 by limiting it to what was known at the time for DOCSIS.  
10:03:11 9 And DOCSIS is a spec -- is a standard, and so there's going  
10:03:14 10 to be changes over time. There's going to be things that  
10:03:17 11 are added and removed of the functions that are known for  
10:03:20 12 DOCSIS.

10:03:21 13 And so I think by limiting it to exactly what is  
10:03:24 14 in the specification, you're really limiting the claims  
10:03:28 15 improperly.

10:03:32 16 And one other part of the specification I want to  
10:03:35 17 focus on that they are -- so this was another example where  
10:03:40 18 they're pointing to MAC being a term that's in the  
10:03:43 19 description, but it's not -- it's not actually MAC  
10:03:47 20 functions. It's talking about the voice driver, which is  
10:03:51 21 something different than what the MAC processor is doing.

10:03:54 22 But here's -- I wanted to turn to Slide 23.

10:03:57 23 This is another portion of the spec that they're  
10:04:00 24 relying on for both MAC processor and DOCSIS controller.  
10:04:05 25 And here, they're discussing the different processors that

10:04:09 1 could be implemented in this embodiment, but the claim only  
10:04:14 2 requires one processor.

10:04:16 3 And so if you read in this portion of the  
10:04:18 4 specification, you're requiring the claims to have two  
10:04:22 5 processors in the cable modem engine, which is not what's  
10:04:25 6 claimed. And so that's another thing that we take issue  
10:04:27 7 with is reading in these limitations when they're not  
10:04:31 8 required by the claim language.

10:04:33 9 THE COURT: Opposing counsel tells me that I  
10:04:36 10 either need to construe this in a way that's consistent  
10:04:40 11 with what he says the specification requires, or it's  
10:04:45 12 clearly indefinite.

10:04:46 13 I've heard your argument as to whether or not it  
10:04:49 14 should be construed as spelled out or as addressed in the  
10:04:53 15 specification.

10:04:54 16 What's your argument in regard to the second part  
10:04:59 17 of that, that if it's not construed consistent with the  
10:05:03 18 guidance from the specification or the embodiment set out  
10:05:09 19 in the specification, then it's unavoidably indefinite?

10:05:12 20 MS. ALLOR: I would say that a POSITA is going to  
10:05:15 21 have no problem reading the claim and knowing what's  
10:05:17 22 covered.

10:05:18 23 If we -- if we look at the claim language itself,  
10:05:23 24 it says: A DOCSIS controller and a DOCSIS MAC processor,  
10:05:27 25 the DOCSIS MAC processor configured to process downstream

10:05:32 1 PDU packets and forward the packets directly to the data  
10:05:35 2 networking engine.

10:05:35 3 So that is one function that the data -- sorry,  
10:05:41 4 that the DOCSIS MAC processor must perform.

10:05:47 5 A POSITA understands what DOCSIS is, as you  
10:05:50 6 mentioned earlier, and as Mr. Benyacar confirmed, and they  
10:05:54 7 know what a MAC processor is. So they understand what the  
10:05:57 8 potential functions are that the MAC processor could  
10:06:00 9 perform, and they understand that it's related to DOCSIS,  
10:06:03 10 and it's described in the specification, but it's not  
10:06:04 11 limited to that.

10:06:06 12 And I think that's the problem we're having is  
10:06:08 13 Charter is asking you to limit it to exactly what's in the  
10:06:11 14 specification when a POSITA would understand that term and  
10:06:14 15 would read the claims and would have clarity without  
10:06:17 16 requiring exactly what's in the specification.

10:06:22 17 THE COURT: All right. What else do you have for  
10:06:24 18 me on these two terms?

10:06:26 19 MS. ALLOR: That's all we have right now on these  
10:06:30 20 two terms.

10:06:32 21 THE COURT: All right.

10:06:32 22 MS. ALLOR: And that's it for the '775.

10:06:35 23 THE COURT: So anything further from Charter on  
10:06:36 24 these two?

10:06:37 25 MR. BENYACAR: Yes, Your Honor, just a quick

10:06:39 1 rebuttal.

10:06:39 2           So Ms. Allor pointed to the different MAC  
10:06:49 3 functions that are performed by the DOCSIS controller, and  
10:06:54 4 she argued, oh, well, they're not really MAC functions for  
10:06:57 5 this reason or that reason or the other reason.

10:07:00 6           None of what she said is in the record. Our  
10:07:02 7 expert provided a declaration explaining that these are  
10:07:07 8 DOCSIS MAC functions. Their expert, Dr. Kramer, did not  
10:07:10 9 say that they're not.

10:07:11 10           So everything you heard Ms. Allor say is just  
10:07:15 11 attorney argument, not in the record, that we're hearing  
10:07:18 12 for the very first time now.

10:07:21 13           And there's no basis for stating that these  
10:07:23 14 various MAC functions that the DOCSIS controller performs  
10:07:28 15 are not really MAC functions just because it's only this or  
10:07:32 16 it's only that or it's only the other thing.

10:07:36 17           You also asked Ms. Allor, well, if I use what  
10:07:38 18 you're saying, why isn't it indefinite?

10:07:44 19           And one thing Ms. Allor didn't do is explain how  
10:07:47 20 if a DOCSIS controller performs DOCSIS MAC functions and  
10:07:51 21 vice versa you can possibly perform the claimed function  
10:07:56 22 of -- without the involvement of the DOCSIS controller.  
10:07:59 23 You asked her why it's not indefinite, and her answer was,  
10:08:03 24 well, of course, someone of skill in the art would know.  
10:08:05 25 She did not explain how you could possibly perform this



10:08:08 1 step because you can't.

10:08:09 2 Finally, the other thing that Ms. Allor did not  
10:08:12 3 say is, oh, well, here is the construction we want, right?  
10:08:17 4 So we know from their -- from their papers that it's --  
10:08:21 5 that what they say, and there's no way to perform the --  
10:08:25 6 without the involvement of the DOCSIS controller under that  
10:08:27 7 definition.

10:08:28 8 And in nowhere in Ms. Allor's presentation did she  
10:08:31 9 say, oh, this is what a DOCSIS MAC processor actually is.  
10:08:35 10 This is what a DOCSIS controller actually is. This is the  
10:08:38 11 reason why a DOCSIS MAC processor does not actually perform  
10:08:45 12 DOCSIS functions.

10:08:46 13 So for those reasons, Your Honor, the only way to  
10:08:53 14 take the meaning just from the words is to say a DOCSIS  
10:08:57 15 controller -- is to say if a DOCSIS controller performs  
10:09:02 16 DOCSIS MAC functions, which the disclosed one does, then  
10:09:05 17 it's a DOCSIS MAC processor as well.

10:09:08 18 And the DOCSIS -- disclosed DOCSIS MAC processor,  
10:09:11 19 under their plain meaning, is also a DOCSIS controller,  
10:09:15 20 just as we have up on this slide. And if that's true, it's  
10:09:18 21 impossible to perform the claimed capability of a DOCSIS  
10:09:25 22 MAC processor forwarding data to a data networking engine  
10:09:28 23 without the involvement of the DOCSIS controller. That  
10:09:31 24 would be impossible, and Ms. Allor had no explanation for  
10:09:34 25 that.

10:09:34 1 Thank you, Your Honor.

10:09:34 2 THE COURT: All right. Thank you, Counsel.

10:09:36 3 Let's go on to -- excuse me. Let's go on to the  
10:09:46 4 '826 patent. And we'll take up the disputed language  
10:09:49 5 regarding network management messages.

10:09:56 6 Let me hear from the Plaintiff, please.

10:09:59 7 MR. ENGEL: Good morning, Your Honor.

10:10:00 8 THE COURT: Good morning.

10:10:01 9 MR. ENGEL: Jason Engel on behalf of the  
10:10:05 10 Plaintiff.

10:10:07 11 And if we could go to Slide 25. All right.

10:10:10 12 I'm going to be talking about the '826 patent, and  
10:10:14 13 as you mentioned the specification term is "network  
10:10:17 14 management messages."

10:10:18 15 So if we go to Slide 26, we have Charter's  
10:10:22 16 construction, which is messages which report on the status  
10:10:27 17 of the network based on an analysis of the measured  
10:10:31 18 characteristic.

10:10:31 19 And, you know, in a vacuum, maybe that seems like  
10:10:36 20 it could be a potential construction, but then we kind of  
10:10:40 21 have to get into what does it exactly mean.

10:10:43 22 But as became clear on briefing, what Charter  
10:10:46 23 wants it to mean is the measured characteristic cannot be  
10:10:49 24 any part of the message that is sent back, and we think  
10:10:53 25 that plainly contradicts with the examples set forth in the

10:10:58 1 specification.

10:10:58 2           So if we go to Slide 27 of our presentation, we  
10:11:03 3 have a passage from the '826 patent at Column 3, Line 60,  
10:11:09 4 through Column 4, Line 2. And it gives examples of the  
10:11:13 5 messages and what they may include.

10:11:15 6           It says the message may comprise, for example,  
10:11:20 7 network status updates indicating whether one or more  
10:11:24 8 communication parameters of one or more received television  
10:11:28 9 or DOCSIS channels are outside of acceptable bounds, and/or  
10:11:32 10 conveying measured/determined characteristics back to a  
10:11:36 11 source of the received signal, e.g., back to the cable head  
10:11:40 12 end.

10:11:40 13           So it clearly envisioned a situation in which the  
10:11:43 14 messages can be an indication something is outside of  
10:11:47 15 acceptable bounds, or it could be the measured  
10:11:51 16 characteristic being conveyed back, or it could be a  
10:11:54 17 combination of both, or it could include other information.

10:11:58 18           Now, the dispute is centered around the wherein  
10:12:01 19 clause shown on Slide 28 for Column -- for Claim 1 of the  
10:12:06 20 '826 patent. And it's the wherein said measured  
10:12:10 21 characteristic is different than said network management  
10:12:14 22 messages.

10:12:14 23           And I don't think this is anything nefarious.  
10:12:17 24 What I think was intended by the claim drafter was  
10:12:20 25 clarifying that you have a message structure that is sent

10:12:23 1 back. It's a message. It's not just a value, some type of  
10:12:27 2 feedback loop that just -- that sends back a value. You  
10:12:33 3 have a message structure. We're dealing with networks.  
10:12:34 4 We're dealing with networks that have messaging structures  
10:12:36 5 in place. And so this is clarifying that what is sent back  
10:12:39 6 just isn't a value. It's an actual network message that is  
10:12:43 7 sent back. In fact, it's a network management message that  
10:12:46 8 is sent back.

10:12:46 9 I don't have anything further, Your Honor. I'm  
10:12:54 10 happy to answer any questions you might have.

10:12:57 11 THE COURT: Let me hear from Defendant first, and  
10:13:02 12 then we'll see if I have additional questions for either  
10:13:05 13 party.

10:13:06 14 MR. ENGEL: Thank you, Your Honor.

10:13:07 15 THE COURT: Thank you.

10:13:07 16 MR. BENYACAR: First, I just want to state clearly  
10:13:16 17 for the record, our position is not that the message that's  
10:13:19 18 sent back cannot include the measured characteristic, or  
10:13:23 19 it's not a network management message. That's not our  
10:13:25 20 position.

10:13:25 21 Our position is you may send a measured  
10:13:29 22 characteristic back, but you also have to send back a  
10:13:33 23 characteristic that's not the measured characteristic, a  
10:13:37 24 different characteristic.

10:13:39 25 I'll go through this in a minute, but this is the

10:13:41 1 basis of the dispute. Okay. If Your Honor, for example,  
10:13:47 2 tells me to go to the store and buy apples and I come back  
10:13:50 3 and I say, I got you something different.

10:13:53 4 You say, what do you mean?

10:13:54 5 I say, I got you a bag of apples.

10:13:56 6 They're saying, well, those are different.

10:13:59 7 That's the basis -- that's their -- the  
10:14:01 8 construction they're really saying is the message with the  
10:14:05 9 apples is different than the apples.

10:14:07 10 What we're saying is if you ask for apples and I  
10:14:11 11 bring you a bag of apples, it's still apples. But it's  
10:14:14 12 oranges that's different. It's what's in the bag that  
10:14:17 13 matters. That's the basis of the dispute.

10:14:22 14 So let's go --

10:14:22 15 THE COURT: So let me ask you this, Counsel.

10:14:23 16 MR. BENYACAR: Yes.

10:14:24 17 THE COURT: I'm interested in knowing exactly what  
10:14:26 18 you mean by the phrase you're proposing an analysis of. I  
10:14:31 19 understand the rest of your proposed construction, but I'm  
10:14:35 20 unclear on what you're trying to convey when you say based  
10:14:39 21 on an analysis of the measured characteristics.

10:14:42 22 MR. BENYACAR: Thank you, Your Honor. I will -- I  
10:14:44 23 will explain that.

10:14:48 24 THE COURT: And maybe that's -- maybe that's  
10:14:49 25 looking in the bag rather than counting the bag as

10:14:52 1 something different than what's in the bag, but I don't get  
10:14:55 2 that from an analysis of.

10:14:56 3 MR. BENYACAR: Understood.

10:14:57 4 So let me tell you what we were trying to do and  
10:15:00 5 how that relates to the actual dispute that are between the  
10:15:03 6 parties that I just articulated.

10:15:06 7 In the patent, that monitoring module 154 -- this  
10:15:09 8 is on Slide 85 -- measures or determines characteristics of  
10:15:13 9 that incoming signal in blue on the left. That's what it  
10:15:17 10 does. That monitoring module that -- can then control the  
10:15:24 11 transmission of network management messages on Slide 86.

10:15:35 12 Now, according to the specification, those network  
10:15:42 13 management messages can include the determined  
10:15:44 14 characteristic itself. So the monitoring module can  
10:15:47 15 measure a characteristic, and then that characteristic can  
10:15:51 16 be included in the network management message. That's the  
10:15:53 17 passage that counsel showed a minute ago.

10:15:55 18 So you see on the bottom at Column 3, Lines 51  
10:16:00 19 through 57, it says: Such messages may comprise conveying  
10:16:04 20 the measured/determined characteristic.

10:16:07 21 That's sending what you measured directly back in  
10:16:10 22 the message.

10:16:10 23 And by the way, that's what '008 patent, Claim 1,  
10:16:16 24 is directed to. In the '008 patent, you report the actual  
10:16:19 25 determined characteristic. In the '826, they didn't claim

10:16:24 1 that. They claimed something different.

10:16:25 2 In the '826 -- well, in the specification, there's  
10:16:32 3 an alternative. That network management message, instead  
10:16:36 4 of conveying what you actually measured, it can do an  
10:16:40 5 analysis of what you measured and report that analysis  
10:16:43 6 back.

10:16:43 7 Now, that -- the example of that given that I have  
10:16:48 8 on the bottom of Lines 51 through 56 of Column 3 is that  
10:16:54 9 based on the -- based on the analysis, you determine that  
10:17:00 10 the DOCSIS channels are outside acceptable bounds. So, in  
10:17:03 11 effect, you do a measurement, and you say, oh, that's  
10:17:05 12 unacceptable.

10:17:06 13 THE COURT: But you're quoting -- you're quoting  
10:17:07 14 the '008, not the '826.

10:17:09 15 MR. BENYACAR: Yes, I'm sorry, the specifications  
10:17:11 16 are identical.

10:17:11 17 THE COURT: All right.

10:17:12 18 MR. BENYACAR: I should have made that clear.

10:17:13 19 THE COURT: Okay.

10:17:13 20 MR. BENYACAR: The specifications of the two  
10:17:14 21 patents are identical. There's no dispute about that.

10:17:17 22 So because the specification -- and we're not  
10:17:24 23 limiting it to, oh, outside acceptable bounds. We're  
10:17:27 24 saying, okay, it's broader. You did an analysis, and you  
10:17:30 25 have some analysis, and we're not limiting it to just

10:17:34 1 determining unacceptability.

10:17:37 2 And we say that's what the '826 is directed to,  
10:17:42 3 meaning in the '008, you claimed returning the measured  
10:17:46 4 characteristic. In the '826, you claimed the other option  
10:17:50 5 that you gave, which is you do an analysis, and you return  
10:17:52 6 that.

10:17:52 7 That's why we're reading it that way because the  
10:17:56 8 spec gives two options. You can return the measured  
10:17:59 9 characteristic, or you can do analysis and return that.

10:18:01 10 You -- here, you said the network management  
10:18:04 11 message is different than the measured characteristic. So  
10:18:06 12 we say, okay, you're claiming the other embodiment. That's  
10:18:09 13 fine.

10:18:10 14 Well, it's an analysis. But here's -- and  
10:18:19 15 that's where we're getting it from. Our construction is at  
10:18:22 16 the bottom here. That's why we're saying it's an analysis  
10:18:25 17 because it's claiming the embodiment outside acceptable  
10:18:29 18 bounds. You did an analysis.

10:18:31 19 As I mentioned when I started, that's not the core  
10:18:37 20 of the parties' dispute here. Entropic's position is you  
10:18:40 21 can return -- have a network management message that  
10:18:43 22 includes one thing, the determined characteristic. And  
10:18:47 23 that doing one thing infringes both the '008 claim, which  
10:18:51 24 says you determine the characteristic itself, and it also  
10:18:55 25 infringes the '826 claim where the measured characteristic



10:18:59 1 is different than the network management message.

10:19:02 2 And we're thinking it can't be both. If you  
10:19:05 3 return the determined characteristic, it can't infringe  
10:19:08 4 Claim 1, which says you return the determined  
10:19:11 5 characteristic, and the '826, which says you return  
10:19:13 6 something different. How can that be?

10:19:15 7 And as I said, this is the crux of the dispute,  
10:19:22 8 which is they say, and we just heard counsel say, oh, well,  
10:19:25 9 what the claim drafter was trying to do here was convey the  
10:19:29 10 idea that messages have a message structure, and the  
10:19:33 11 message structure has the characteristic in it, and the  
10:19:36 12 message structure with the message is different than the  
10:19:39 13 characteristic.

10:19:40 14 None of that is anywhere in the specification.  
10:19:43 15 There's no idea or concept in the specification of the  
10:19:47 16 message somehow being -- the message with the  
10:19:49 17 characteristic being different than just the  
10:19:52 18 characteristic.

10:19:53 19 So that is the heart of the dispute here. And as  
10:20:01 20 counsel just said, he said, well, everyone understands that  
10:20:05 21 a message is different than what you send. Everyone  
10:20:13 22 understands that.

10:20:14 23 Now, this idea is not in the specification at all.  
10:20:17 24 So that's what he's saying everyone just knows that. But  
10:20:19 25 if everyone knows that, that the message with carrying

10:20:22 1 something is different than the thing that it's carrying,  
10:20:25 2 then the claim language, wherein said measured  
10:20:27 3 characteristic is different than the network management  
10:20:29 4 messages, that would be redundant because counsel says by  
10:20:33 5 its nature it's different.

10:20:35 6 He has to say by its nature because the spec  
10:20:38 7 doesn't disclose anything about messages being different  
10:20:41 8 than the characteristics. So you would be vitiating this  
10:20:46 9 claim limitation.

10:20:46 10 Now, I thought Your Honor would ask the question  
10:20:52 11 about the analysis, and that's why if Your Honor is not  
10:20:55 12 inclined to say that the network management message, which  
10:20:59 13 is different than the measured characteristic, is an  
10:21:02 14 analysis, even though that's the only other thing the  
10:21:04 15 patent discloses, it at least has to send a characteristic  
10:21:10 16 that's different from the measured characteristic. It's  
10:21:11 17 not different just because the measured characteristic is  
10:21:14 18 within the message.

10:21:16 19 That's the heart of the parties' dispute here.  
10:21:19 20 And that's what I tried to capture on Slide 96 by providing  
10:21:22 21 an alternative construction.

10:21:23 22 The jury cannot be allowed, in our view, to be --  
10:21:27 23 to just have a plain meaning and then have them argue to  
10:21:31 24 the jury, well, the message is different than what's  
10:21:33 25 carrying the message. That's not -- that's not what

10:21:35 1 network management messages means.

10:21:39 2 THE COURT: All right.

10:21:40 3 MR. BENYACAR: Thank you, Your Honor.

10:21:40 4 THE COURT: Thank you.

10:21:47 5 Any follow-up from the Plaintiff?

10:21:52 6 MR. ENGEL: Yes, briefly, Your Honor.

10:21:55 7 If you recall in counsel's -- Mr. Benyacar's

10:22:12 8 argument, a construction that they propose is messages

10:22:18 9 which report on the status of the network based on an

10:22:21 10 analysis of the measured characteristic.

10:22:23 11 And if you look at what's in Slide 90 of their

10:22:28 12 demonstrative slides, you'll see that they're requiring an

10:22:31 13 extra step to be performed that's not required by the

10:22:33 14 claim.

10:22:33 15 So the analysis that's in the claims is an

10:22:39 16 analysis of the signal to measure a characteristic. So

10:22:42 17 that's the only analysis that's required of the claim, and

10:22:45 18 that's what next to the red box they put

10:22:49 19 measured/determined characteristics of signals. That's the

10:22:51 20 analysis.

10:22:51 21 They then required a separate analysis of

10:22:54 22 determined characteristics, for example, outside acceptable

10:22:58 23 bounds. And so they required a separate step that we don't

10:23:01 24 think is required by the claim at all.

10:23:04 25 And, you know, as we went back to -- if we could

10:23:07 1 have our presentation, please.

10:23:09 2 The plain language of the spec says that these  
10:23:18 3 network management messages can include the "and/or," and  
10:23:21 4 the "or" being conveying the measured or determined  
10:23:26 5 characteristic back to a source of the received signal.

10:23:28 6 We haven't seen any analysis of the prosecution  
10:23:30 7 history that a message containing the determined  
10:23:33 8 characteristic was disclaimed somehow. And our point is  
10:23:36 9 that, you know, the envelope that carries the message isn't  
10:23:39 10 the message inside.

10:23:41 11 You know, the envelope can include the contents  
10:23:43 12 and can include other things. It is different than just  
10:23:47 13 sending back the piece of paper that has the answer on it,  
10:23:50 14 you know, or the value itself, which we think was what was  
10:23:53 15 intended to be covered by the claim.

10:23:55 16 THE COURT: All right. Thank you.

10:23:57 17 MR. ENGEL: Thank you, Your Honor.

10:24:00 18 I think I am up next on the '008, unless you tell  
10:24:03 19 me that you would like to hear from opposing counsel first.

10:24:06 20 THE COURT: Well, I'll be honest, I'm usually  
10:24:10 21 tempted to hear first from the party that gives me a  
10:24:14 22 proposed specific construction, and I'm inundated with  
10:24:18 23 plain and ordinary meaning from your side in this case.  
10:24:22 24 And had I gotten more specific proposed constructions from  
10:24:25 25 the Plaintiff, I might have approached the order of things

10:24:28 1 differently. But I have what I have.

10:24:32 2 But as long as you're at the podium, go ahead and  
10:24:35 3 give me your argument on "operable to."

10:24:41 4 MR. ENGEL: I think we've agreed to that term --

10:24:43 5 THE COURT: That's right. I have a note here that  
10:24:46 6 you have agreed.

10:24:46 7 MR. ENGEL: -- with Defendant. Excuse me.

10:24:47 8 THE COURT: Okay. Configured to is the agreement;  
10:24:52 9 is that right?

10:24:52 10 MR. ENGEL: Correct, Your Honor.

10:24:53 11 THE COURT: Defendant concurs with that?

10:24:55 12 MR. BENYACAR: Yes, Your Honor.

10:24:55 13 THE COURT: Okay. Then let's go on to "digitize a  
10:25:03 14 received signal spanning an entire television spectrum,"  
10:25:07 15 again, from Claim 1 of the '008.

10:25:11 16 MR. ENGEL: Sure. So we're on Slide 30 of our  
10:25:13 17 presentation, and it's -- the full term is "digitize a  
10:25:18 18 received signal spanning an entire television spectrum  
10:25:21 19 comprising a plurality of television channels."

10:25:25 20 We have proposed plain and ordinary meaning for  
10:25:27 21 this, Your Honor. The Defendant has proposed an  
10:25:30 22 exclusionary construction. I would say that the received  
10:25:35 23 signal contains only television channels.

10:25:37 24 And I think this is a plain misreading not only of  
10:25:40 25 the claim language but of the specification and what those

10:25:42 1 of skill in the art understand about television spectrums  
10:25:46 2 and how they're used in the context of these hybrid  
10:25:49 3 fiber-coaxial networks that include DOCSIS networks, for  
10:25:54 4 example.

10:25:54 5 If we go to Slide 31, we have a couple of examples  
10:25:57 6 of what the received signal that's going to come into the  
10:26:00 7 front end of the device is going to be. One example is a  
10:26:04 8 signal that has a plurality of television and/or DOCSIS  
10:26:08 9 channels that are, you know, multiplexed together into a  
10:26:12 10 single signal.

10:26:13 11 We have another passage from the patent where it  
10:26:19 12 talks about television and/or DOCSIS channels being part of  
10:26:23 13 the signal. Those citations are listed on Slide 31 of our  
10:26:26 14 demonstrative slides.

10:26:27 15 But here's the example I think on Slide 32 that  
10:26:30 16 really gives you an example of what is taking place.

10:26:33 17 There's multiple exemplary signals and spectrums  
10:26:39 18 given there. And these are based on the available  
10:26:43 19 commercial spectrums at the time.

10:26:44 20 And one of those is a cable television signal,  
10:26:47 21 which typically was from about 55 megahertz to a  
10:26:53 22 1002 megahertz. This is the downstream signal on a cable  
10:26:57 23 television system. And this signal can be divided up into  
10:27:00 24 a number of different ways.

10:27:01 25 This is the spectrum, it spans from 55 to 1002.

10:27:05 1 The cable operator can put legacy television channels on  
10:27:10 2 there. They can put legacy data channels, which would be  
10:27:13 3 SC-QAM channels. They can put what's now known as OFDMA  
10:27:18 4 data channels on there. They can leave some of those  
10:27:20 5 channels empty because maybe there's interference in the  
10:27:23 6 network. But that's the entire television spectrum.

10:27:25 7 The claim clarifies that that spectrum has to  
10:27:28 8 include television channels. That's the comprising element  
10:27:30 9 of it. But it doesn't say you must exclude every other  
10:27:35 10 type of, you know, channel or signal from that global  
10:27:42 11 entire television signal. I think that's where the dispute  
10:27:45 12 lies for this term.

10:27:46 13 And I think that based on the specification that  
10:27:50 14 reading out -- that you can include data channels, for  
10:27:55 15 example, in that television spectrum would just fly in the  
10:27:59 16 face of what's in the plain language of the spec and the  
10:28:01 17 plain language of the claims.

10:28:02 18 There's one other term for this patent, Your  
10:28:04 19 Honor. I assume you want to address that separately?

10:28:07 20 THE COURT: Yes.

10:28:09 21 MR. ENGEL: Okay. Then I am done unless you have  
10:28:10 22 any questions.

10:28:11 23 THE COURT: I'd be interested to know how you  
10:28:14 24 account for the recital in the '826, which is a  
10:28:20 25 continuation of the '008, of one or both television and

10:28:26 1 data channels in Claim 1 --

10:28:26 2 MR. ENGEL: Well, I think --

10:28:28 3 THE COURT: -- in the '826.

10:28:29 4 MR. ENGEL: -- I think that is a clarification,  
10:28:31 5 and I believe the language is -- yeah, I think that the  
10:29:06 6 clarification there is it can be one or both of television  
10:29:10 7 channels and data channels. So the example there is you  
10:29:12 8 could have only television channels, or you could have only  
10:29:15 9 data channels, or you could have both.

10:29:18 10 And so I think that's the point that it's saying  
10:29:20 11 there is that this would cover a situation where you have  
10:29:23 12 only data. It would cover a situation where you have only  
10:29:27 13 television. It would cover a situation where you have a  
10:29:29 14 mix. Whereas the '008 requires you to have television  
10:29:32 15 channels. Like, you must have television channels in the  
10:29:35 16 '008. We concede that. But it doesn't mean that you can't  
10:29:38 17 have data channels or, you know, channels with no  
10:29:41 18 information on them in that spectrum.

10:29:44 19 THE COURT: All right. With that, let me hear  
10:29:46 20 from the Defendant in response, please.

10:30:06 21 Let me ask you that -- this, Mr. Benyacar, to  
10:30:08 22 start off with. Your proposed construction would limit  
10:30:12 23 this received signals to only television channels.

10:30:16 24 Why can't a television spectrum include more than  
10:30:19 25 just television channels? Doesn't -- doesn't the



10:30:22 1 specification address that?

10:30:23 2 MR. BENYACAR: No, Your Honor.

10:30:26 3 The specification certainly does disclose  
10:30:30 4 embodiments, and we don't dispute this, where the incoming  
10:30:32 5 signal includes television and/or data channels. We don't  
10:30:35 6 dispute that that's in the specification.

10:30:37 7 In fact, it's in the passage -- I think counsel  
10:30:40 8 may have shown this that I have up. It says: The signal S  
10:30:44 9 may be the result of a plurality of television and/or  
10:30:46 10 DOCSIS channels, which are data channels.

10:30:49 11 We agree, the specification discloses that.  
10:30:53 12 However, the specification also discloses an embodiment  
10:30:57 13 that spans the television spectrum.

10:30:59 14 And you notice in this portion of the spec in the  
10:31:02 15 abstract, it says: The spanning an entire television  
10:31:06 16 spectrum comprising a plurality of television channels.

10:31:09 17 They didn't mention the data channels here. And  
10:31:14 18 there's a reason for that, because spanning has a plain  
10:31:19 19 meaning.

10:31:22 20 Again, Plaintiff's position is this term should be  
10:31:24 21 construed -- construed to its plain and ordinary meaning.  
10:31:28 22 Well, the plain meaning of span is full extent. A wing  
10:31:32 23 span, a bridge span, we know what that means. And  
10:31:35 24 consistent with the specification's own description of the  
10:31:39 25 spanning embodiment, which only makes reference to the

10:31:41 1 television channels, that's what -- that's what this  
10:31:46 2 limitation covers.

10:31:47 3 Now, as Your Honor pointed out, the patentee knew  
10:31:53 4 how to claim the other embodiment. In the '826, Claim 1,  
10:31:57 5 the language in green is the exact language that I showed a  
10:32:00 6 minute ago. The channels comprise one or both of  
10:32:03 7 television channels and/or data channels. They knew how to  
10:32:07 8 claim that.

10:32:08 9 In the '008, they claimed the spanning embodiment,  
10:32:12 10 which is only the television channels.

10:32:13 11 Now, I will say this, in Entropic's reply brief  
10:32:20 12 for the first time -- and I'm not sure if this is what they  
10:32:24 13 intended, but they have never said this before. I  
10:32:26 14 understood what they were saying --

10:32:27 15 THE COURT: Let me interrupt just a minute --

10:32:29 16 MR. BENYACAR: Yes. I'm sorry, Your Honor.

10:32:29 17 THE COURT: -- before I lose my thought here.

10:32:34 18 The claim language talks about received signal  
10:32:40 19 spanning an entire television spectrum comprising a  
10:32:43 20 plurality of television channels. Now, comprising a  
10:32:46 21 plurality of television channels tells me that television  
10:32:50 22 channels are in the television spectrum. It doesn't tell  
10:32:53 23 me that only television channels are in the television  
10:32:58 24 spectrum.

10:32:58 25 So what tells me that there can't be more than

10:33:04 1 channels, television channels in the television spectrum is  
10:33:07 2 what I'm trying to ask?

10:33:09 3 MR. BENYACAR: Thank you, Your Honor.

10:33:09 4 And that -- your -- what Your Honor just said, I  
10:33:14 5 believed, was the position they took for the first time in  
10:33:16 6 their reply brief. This is how I understood their  
10:33:19 7 position, and this is how I understand Your Honor's  
10:33:21 8 question, which is you can have an entire spectrum of  
10:33:27 9 frequencies. Let's say from zero to a gigahertz, which I  
10:33:31 10 show at the top.

10:33:32 11 Part of that is where the television channels are.  
10:33:34 12 If I understand Your Honor's question correctly is, well,  
10:33:39 13 how about can there be, like, data channels or other things  
10:33:43 14 in there? That's how I understood what they say in their  
10:33:46 15 reply brief, and that's how I understand Your Honor's  
10:33:49 16 question, which is you have the television spectrum, which  
10:33:52 17 is in blue, but within the television spectrum, there are  
10:33:56 18 other things. And that's the comprising, if I understand  
10:34:00 19 Your Honor's question about that.

10:34:02 20 THE COURT: Well, that, and then as an  
10:34:04 21 alternative, why couldn't the non-television channels be in  
10:34:07 22 the gray portion of your spectrum?

10:34:09 23 MR. BENYACAR: Well, because that's outside the  
10:34:10 24 span, Your Honor.

10:34:12 25 So you can't read the spanning part out. So you

10:34:16 1 have a -- you have a spectrum that spans the television  
10:34:22 2 spectrum, and it comprises. So the comprises might mean  
10:34:26 3 within that spectrum --

10:34:27 4 THE COURT: Okay. So the blue was the television  
10:34:29 5 spectrum?

10:34:30 6 MR. BENYACAR: Correct, Your Honor.

10:34:31 7 THE COURT: Okay. I just didn't read your example  
10:34:33 8 right.

10:34:33 9 MR. BENYACAR: I'm sorry. So, yes, blue is the  
10:34:36 10 television spectrum.

10:34:37 11 THE COURT: Okay.

10:34:37 12 MR. BENYACAR: And within that, there could be  
10:34:39 13 channels.

10:34:39 14 Now, the truth is, and we didn't hear this from  
10:34:43 15 them until their reply brief, that's not the way television  
10:34:46 16 spectrums work. It doesn't work that way, which is why we  
10:34:49 17 didn't include that in the construction, and it's why when  
10:34:52 18 the specification refers to the spanning, it doesn't  
10:34:55 19 reference data channels because it's not the way it works.

10:34:58 20 But we don't want -- we don't want to get hung up  
10:35:02 21 on that. So if Your Honor believes that that's -- that  
10:35:08 22 that's what the claim language means, we've proposed, in  
10:35:12 23 addition, in response to what they said in their reply  
10:35:15 24 brief, that the received signal contains only television  
10:35:20 25 channels and data channels which fall between television

10:35:22 1 channels.

10:35:22 2 And that, I believe, addresses Your Honor's  
10:35:26 3 question about what I show on Slide 82, which is, okay,  
10:35:30 4 fine. But it has to be within the blue because otherwise  
10:35:34 5 you're vitiating the spanning limitation.

10:35:41 6 THE COURT: All right.

10:35:42 7 MR. BENYACAR: Thank you, Your Honor.

10:35:48 8 THE COURT: Let me get the Plaintiff to react to  
10:35:50 9 that alternative.

10:35:53 10 MR. ENGEL: I'm not sure that the -- Your Honor,  
10:36:03 11 that the modified construction would suffice for us, and I  
10:36:10 12 think the first time we're hearing it is, you know, during  
10:36:13 13 the presentation today.

10:36:13 14 I think the main issue that we were trying to  
10:36:16 15 cover and actually brings in one of the dependent claims  
10:36:23 16 is, you know, there is an entire television spectrum  
10:36:27 17 that's something that's known in the art. And for --  
10:36:29 18 when you have cable at home, you get a wide spectrum.  
10:36:32 19 That spectrum includes television channels. It includes  
10:36:34 20 data channels, whether you use them or not. It includes  
10:36:37 21 unused signals. But it spans from a low point to a high  
10:36:43 22 point.

10:36:43 23 And they're trying to limit it just to the point  
10:36:45 24 that may be carrying data. And there's different ways you  
10:36:47 25 can configure that because there's different impairments

10:36:49 1 that you have with AM/FM interference, LTE interference.

10:36:53 2 What they're -- what they're really trying to do  
10:36:55 3 is say the entire television spectrum consists of  
10:36:57 4 television channels or consists of how they've defined it  
10:37:01 5 narrowly to be just that narrowband there.

10:37:04 6 So I think if you look at Dependent Claim 3 of the  
10:37:09 7 '008 patent -- and I don't know if you have it in front of  
10:37:10 8 Your Honor. I can put it --

10:37:12 9 THE COURT: No, I do.

10:37:14 10 MR. ENGEL: -- up on the screen.

10:37:15 11 This kind of gets to the heart of -- not Dependent  
10:37:18 12 Claim 3, it would be Dependent Claim 2, I believe. I  
10:37:25 13 misspoke.

10:37:25 14 Yes. So Dependent Claim 2 gets to kind of what  
10:37:28 15 the heart of the part of the invention is. And, again, I  
10:37:32 16 think it's important to look at the claims as a whole and  
10:37:35 17 the spec as a whole.

10:37:37 18 This says that the first portion of the digitized  
10:37:41 19 signal spans that entire television spectrum. So this is  
10:37:45 20 the spectrum that the cable operator, which is the source  
10:37:48 21 of the signal, is providing out to their customers. And so  
10:37:51 22 that -- it's a very wide signal.

10:37:55 23 Now, what you're passing to the data processor is  
10:37:59 24 a television channel or a television content, but the  
10:38:01 25 signal monitor can look at the entire spectrum, and it can

10:38:05 1 see if there are issues from the top to the bottom.

10:38:07 2           So if you were limited to only that portion that  
10:38:10 3 carried television or television interspersed with data,  
10:38:14 4 the Defendant's construction is saying you can't analyze  
10:38:17 5 the entire television spectrum you've provided to your  
10:38:20 6 customers. And that's the whole point of this invention is  
10:38:22 7 to see if we're sending out a wide signal, is our customer  
10:38:27 8 having issues across that whole signal? If so, then we can  
10:38:31 9 fix those problems.

10:38:31 10           But if you limit it to only the portion that  
10:38:34 11 carries television or television interspersed with data,  
10:38:38 12 you're leaving out other parts of the signal that would  
10:38:41 13 span that entire television spectrum.

10:38:43 14           So I think in view of the specification, you know,  
10:38:46 15 what is an entire television spectrum is clear from the  
10:38:51 16 specification and is something that, you know, should be  
10:38:53 17 put to the jury to decide.

10:38:57 18           THE COURT: All right.

10:39:06 19           MR. ENGEL: I think we have one more term on the  
10:39:10 20 '008 patent, Your Honor. Again, I don't know who you'd  
10:39:13 21 prefer to hear from first.

10:39:20 22           THE COURT: Let me hear from you, Counsel, since  
10:39:22 23 you're there at the podium.

10:39:23 24           MR. ENGEL: Okay.

10:39:24 25           THE COURT: This is "signal monitor" --

10:39:26 1 MR. ENGEL: Yeah.

10:39:27 2 THE COURT: -- "data processor," "channelizer"?

10:39:31 3 MR. ENGEL: That is correct. And the -- we're on  
10:39:37 4 Slide 33 of our presentation.

10:39:40 5 If I could have the next slide, please. I'm  
10:39:43 6 sorry. Slide 34, please.

10:39:46 7 So I think this gets down to the heart of the  
10:39:52 8 dispute because we're not entirely sure what is being  
10:39:56 9 proposed by Charter. Their construction is three separate  
10:40:01 10 pieces of hardware configured to perform the functions the  
10:40:04 11 claim ascribes to the signal monitor, data processor, and  
10:40:10 12 channelizer, respectively.

10:40:11 13 Now, they've cited case law that talks about  
10:40:13 14 distinctness, and I think distinctness is, you know, a  
10:40:16 15 degree of something that could be put to the jury to decide  
10:40:19 16 or put to the -- you know, the factfinder to decide.

10:40:23 17 But when you're saying that it's three separate  
10:40:25 18 pieces of hardware, Charter seems to be implying that you  
10:40:29 19 could not have some type of, you know, single integrated  
10:40:33 20 circuit or single silicon die that has those three, you  
10:40:39 21 know, functional blocks or components. They can still be  
10:40:43 22 distinct if they're on the same integrated circuit.

10:40:46 23 And that's what we pointed to at the '008 patent,  
10:40:48 24 Column 4, Lines 51 to 62. It says: The various modules of  
10:40:52 25 the subassembly 174 -- which includes the channelizer, the



10:40:56 1 signal monitor, and the data processor -- may reside in one  
10:41:00 2 or more housings on one or more printed circuit boards  
10:41:03 3 and/or one or more integrated circuits, e.g., one or more  
10:41:08 4 silicon dice.

10:41:09 5           So if you have one integrated circuit that  
10:41:12 6 includes those three components, that clearly should meet  
10:41:15 7 the claim as set forth in the specification, but this  
10:41:17 8 requirement that they be separate hardware units, I think,  
10:41:20 9 is reading something into the claim language and is going  
10:41:23 10 to be a little bit confusing down the road to say what's  
10:41:27 11 separate hardware.

10:41:27 12           Again, I believe the case law they cited is  
10:41:30 13 distinct, and I think we agree that there's argument as to  
10:41:34 14 what's going to be distinct when we identify things for  
10:41:37 15 infringement down the road. But requiring that it be three  
10:41:39 16 separate pieces of hardware, I think, is reading  
10:41:42 17 limitations into the claim.

10:41:43 18           THE COURT: All right. Let me hear from the  
10:41:47 19 Defendant, please. What's Charter's position on this,  
10:42:04 20 Counsel?

10:42:05 21           MR. BENYACAR: Charter's position on this, Your  
10:42:06 22 Honor, is that they have to be three separate pieces of  
10:42:09 23 hardware, three distinct structural elements, however you  
10:42:13 24 want to say it.

10:42:14 25           The reason for that is they're called out

10:42:18 1 separately in the claim. As I show on Slide 52, it's a  
10:42:25 2 signal monitor, a data processor, and a channelizer.

10:42:28 3 And the law is clear, and this is the law that  
10:42:30 4 counsel was pointing to, if you list elements separately,  
10:42:35 5 they're presumed to be distinct components, distinct  
10:42:40 6 structural elements.

10:42:41 7 And by the way, as the Federal Circuit said in the  
10:42:49 8 Kyocera case, even if you disclose different embodiments,  
10:42:53 9 one where they're combined and one where they're separate,  
10:42:58 10 you're free to claim the one where they're separate.

10:43:00 11 Here, there is no embodiment disclosed where  
10:43:04 12 they're combined. But there is a presumption, if you call  
10:43:08 13 them out separately, that they're distinct structural  
10:43:11 14 elements. That is our position. Our position is not just  
10:43:14 15 relying on the presumption that they're distinct structural  
10:43:17 16 elements, but there is no way to understand the  
10:43:20 17 specification or the claims unless they're distinct  
10:43:24 18 structural elements.

10:43:25 19 THE COURT: How do you get away from the problem  
10:43:28 20 you can say on the one hand, there's three separate  
10:43:31 21 components, on the other hand, there's one component with  
10:43:36 22 three different subparts? I mean, how do you -- how do you  
10:43:40 23 not just go down the pyramid far enough to where you have  
10:43:45 24 all these functions within one component, even though  
10:43:49 25 you're calling them separate things?

10:43:51 1 MR. BENYACAR: So we're not saying that you can't  
10:43:53 2 have discreet structural elements on some bigger device.  
10:43:58 3 We're not -- we're not saying that.

10:43:59 4 But it can't just all be, well, it's one  
10:44:03 5 processor, and it's just performing different functions,  
10:44:05 6 for example. If you have distinct pieces of hardware all  
10:44:09 7 on the same chip that sends information to each other,  
10:44:12 8 we're not saying that that's not covered. But they have to  
10:44:14 9 be distinct hardware, distinct structural elements.

10:44:17 10 If they're on some bigger thing, that's okay.  
10:44:20 11 That's not our argument. But the only way the  
10:44:23 12 specification and claims make sense is if they're different  
10:44:27 13 hardware and if they're different --

10:44:29 14 THE COURT: So are we back to talking about  
10:44:32 15 physical separation versus functional separation?

10:44:36 16 MR. BENYACAR: So functional separation, yes. In  
10:44:38 17 this particular case, it has to be physical separation.  
10:44:41 18 One, because the claim -- the case law we just looked at  
10:44:43 19 says distinct structural components; and, number two, is,  
10:44:49 20 as I'm about to talk about, there's no way to understand  
10:44:51 21 the specification or the claims unless they're distinct  
10:44:53 22 structural claims.

10:44:57 23 The claims show -- I mean, I'm sorry, the figure  
10:44:59 24 shows the channelizer, the monitor, and the data processor  
10:45:04 25 in Figure 1B. Now, you can look at Figure 1B and say,

10:45:09 1 yeah, they're separate, right? You drew them separately.

10:45:11 2 But let's talk about what they do.

10:45:13 3 The channelizer outputs bands to the data  
10:45:20 4 processing module, outputs. That's what the specification  
10:45:24 5 says. There's no way to understand output from one place  
10:45:27 6 to the other unless those two things are separate,  
10:45:30 7 physically separate. And the claim requires this. The  
10:45:33 8 claim requires that the channelizer output signal to a data  
10:45:39 9 processor. There's no way to understand that unless  
10:45:41 10 there's physical separateness. That's what output means.

10:45:45 11 That's separate from the channelizer outputting to  
10:45:49 12 the data processor. The channelizer also outputs to the  
10:45:52 13 monitoring module. There's no way to understand that  
10:45:55 14 unless those two are separate, distinct structural  
10:46:00 15 components.

10:46:00 16 The claim also requires that. The claims and the  
10:46:04 17 spec require that they be separate structural components.  
10:46:08 18 And so we're not just relying on the legal presumption.

10:46:16 19 On Slide 60, I show what the specification says  
10:46:21 20 about the monitoring module and the data processor. It  
10:46:23 21 says, they are in a, quote, unquote, parallel arrangement.  
10:46:28 22 There's no way for two things to be in a parallel  
10:46:31 23 arrangement unless they're physically separate.

10:46:33 24 The specification also says that the monitoring  
10:46:42 25 module and the data processing module concurrently process.

10:46:46 1 Well, if they're all one processor, they're not  
10:46:48 2 concurrently processing.

10:46:50 3 The claims require that the channelizer  
10:46:55 4 concurrently output to two different places, to the  
10:46:59 5 monitoring module and the data processing module.

10:47:03 6 Everything in the specification and the claims dictates  
10:47:06 7 that they have -- all three of those have to be distinct  
10:47:08 8 pieces of hardware, distinct structural components.

10:47:12 9 In fact, Your Honor, in Entropic's own brief, when  
10:47:16 10 they're trying to explain how Figure 1B works, they assume  
10:47:21 11 they're separate because you can't explain it otherwise.

10:47:25 12 This is from their opening brief at Page 3. They  
10:47:27 13 say there's a channelizer in blue that concurrently outputs  
10:47:30 14 to a monitoring device, and then outputs the other one to a  
10:47:33 15 data -- to a data processing device. There's no way to  
10:47:38 16 even explain how it works unless they're three separate  
10:47:40 17 ones. Even Entropic couldn't do it.

10:47:43 18 But when it comes to the claims, then they say,  
10:47:53 19 oh, well, the claims just don't require it. They have no  
10:47:56 20 explanation of everything we just talked about. They just  
10:47:58 21 say, oh, well, the claims don't require any physical  
10:48:01 22 separateness or different pieces of hardware.

10:48:03 23 Now, nowhere in any of their briefing, in their  
10:48:07 24 opening or their reply, do they explain how if the  
10:48:12 25 channelizer and data processing and signal monitor are all

10:48:15 1 one piece of hardware, how you would do the outputting from  
10:48:18 2 the channelizer to the data processor, nor do they explain  
10:48:23 3 how you do outputting from the channelizer to the signal  
10:48:26 4 monitor, nor do they explain how you can have concurrent  
10:48:30 5 outputs from the channelizer to two separate places if all  
10:48:34 6 three are the same device, nor do they explain how the data  
10:48:38 7 processor and the signal monitor can be in a parallel  
10:48:41 8 arrangement if they're all the same the device, or do they  
10:48:45 9 explain how the data processor and signal monitor can do  
10:48:46 10 concurrent processing if they're all wrapped up in the same  
10:48:48 11 processor. They have no explanation for any of these  
10:48:51 12 things.

10:48:51 13           Instead, they point to one sentence from the spec,  
10:48:53 14 which is basically intended to say, you can implement this  
10:48:57 15 however you want, right? Consistent with everything we've  
10:49:00 16 said, you can implement this however you want. You can use  
10:49:03 17 multiple -- you can have multiple housings, one or more  
10:49:11 18 circuit boards, one or more integrated circuits. It's a  
10:49:15 19 broad statement that says, based on everything we've talked  
10:49:17 20 about, you can implement it however you want.

10:49:20 21           But they're reading it so that the one line, the  
10:49:23 22 one e.g., one or more silicon die, and it says one, that  
10:49:26 23 that means the whole thing can be the same device, and you  
10:49:27 24 can ignore everything else the specification and the claims  
10:49:30 25 say. That's not what that sentence means. The sentence is

10:49:33 1 a broad statement. You can implement it however you want  
10:49:35 2 consistent with the disclosure.

10:49:37 3 THE COURT: Is there something unique about the  
10:49:40 4 word "output"? Does it -- is it not -- can it not be  
10:49:43 5 argued to be a synonym for simply sending or transferring?  
10:49:47 6 Has it got to pass some boundary to be an output, that if  
10:49:51 7 it transfers without passing the boundary, it's not an  
10:49:54 8 output? I'm trying to get your view on that.

10:49:58 9 MR. BENYACAR: Yes. So I believe output has a  
10:50:01 10 plain meaning, which is out. It was in, and now it's out.  
10:50:04 11 You're outputting.

10:50:05 12 THE COURT: But in and out of what?

10:50:07 13 MR. BENYACAR: Well, in and out of the hardware  
10:50:09 14 device. That's the channelizer. So we say it's a separate  
10:50:12 15 structural element. It's a different hardware device.

10:50:14 16 When you're outputting, you can look at the  
10:50:18 17 disclosed embodiment, the channelizer is in red. That  
10:50:21 18 channelizer is a piece of hardware. It's outputting those  
10:50:25 19 two lines. It's leaving the device and going to another  
10:50:27 20 device.

10:50:38 21 THE COURT: Well, the quandary, as I see it, is  
10:50:41 22 you can say in this drawing that you put up here from the  
10:50:47 23 figures, you can say that the channelizing -- channelizer,  
10:50:50 24 the data processing, and the monitoring are three different  
10:50:51 25 components. But you can also say it's one component with

10:50:59 1 three subcomponents. And so this is outputting within the  
10:51:03 2 one component from subcomponent to other subcomponent.

10:51:07 3 It seems like to me it's just an issue of how much  
10:51:10 4 you subdivide or don't subdivide, and that seems to be as  
10:51:14 5 much a matter of semantics as anything else.

10:51:17 6 MR. BENYACAR: Well, so --

10:51:18 7 THE COURT: And that's where I -- that's where I  
10:51:20 8 find it to be somewhat of a quandary.

10:51:23 9 MR. BENYACAR: So if you -- if the blue -- the  
10:51:27 10 green -- I think you drew a green box around all three of  
10:51:31 11 them.

10:51:32 12 THE COURT: I did.

10:51:32 13 MR. BENYACAR: If within the green box you had a  
10:51:34 14 red box that was its own -- thank you.

10:51:37 15 So you've got a green box that covers everything.  
10:51:39 16 Let's say that's one big device, what you drew in green.  
10:51:42 17 Within that box, there's a smaller hardware device. That's  
10:51:45 18 the red. We're not saying it's not covered because there's  
10:51:49 19 a green box. It's still outputting from the smaller red  
10:51:53 20 box to another box, which is the monitoring module.

10:51:57 21 THE COURT: All right.

10:51:58 22 MR. BENYACAR: Certainly what Your Honor has drawn  
10:52:00 23 as the green box, we expect that those distinct structural  
10:52:04 24 elements will be within a larger device for sure. But  
10:52:10 25 you -- there still has to be other hardware devices within



10:52:14 1 that bigger device.

10:52:16 2 And if the Court issues our construction, which  
10:52:20 3 is -- which is a separate piece of hardware, or the way the  
10:52:24 4 claim -- the way the Federal Circuit cases are articulated  
10:52:28 5 is distinct structural elements, the jury will then look at  
10:52:31 6 what we have and say, okay, is the channelizer a distinct  
10:52:35 7 structural element from the data processor? That would be  
10:52:37 8 the jury's quandary.

10:52:39 9 They shouldn't be left to be able to think it  
10:52:42 10 doesn't matter. It can all be mixed up in the same thing,  
10:52:46 11 which is what the Plaintiff's position is.

10:52:47 12 THE COURT: All right.

10:52:48 13 MR. BENYACAR: Thank you, Your Honor.

10:52:48 14 THE COURT: Thank you.

10:52:56 15 Let's do this, Counsel, we've almost been in here  
10:52:59 16 two hours. Let's take a short 10-minute plus or minus  
10:53:02 17 recess.

10:53:03 18 When we come back, we'll turn to the '690 patent  
10:53:07 19 and take up "probe" and "physical layer probe."

10:53:12 20 But until then, let's take a short recess.

10:53:14 21 The Court stands in recess.

10:53:15 22 COURT SECURITY OFFICER: All rise.

10:53:17 23 (Recess.)

10:53:18 24 COURT SECURITY OFFICER: All rise.

11:05:48 25 THE COURT: Be seated, please.

11:05:52 1 All right. Let's continue with claim construction  
11:05:56 2 in the Entropic versus Charter matter. And let's turn to  
11:06:00 3 the '690 patent. We'll take up "probe" and "physical layer  
11:06:05 4 probe."

11:06:06 5 Let me hear from the Defendant on this first,  
11:06:07 6 please.

11:06:21 7 MR. BENYACAR: Thank you, Your Honor.

11:06:25 8 Your Honor, the specification tells us what a  
11:06:30 9 probe is. A probe does have a plain meaning, and it's  
11:06:34 10 entirely consistent with what the specification says.

11:06:36 11 The specification says that probes are typically  
11:06:40 12 well-known -- are typically well-defined, I'm sorry, and  
11:06:44 13 are sent between nodes of a network.

11:06:47 14 So in this example -- and this is the example we  
11:06:50 15 used in the tech tutorial, you have a probe that has a  
11:06:53 16 known form, a known bit pattern, and that's defined in  
11:06:58 17 advance. It has a known form.

11:07:02 18 According to the patent, the Node 2, which is  
11:07:05 19 called the probe transmitter because it's transmitting the  
11:07:08 20 probe, is sent to the probe receiver which receives the  
11:07:14 21 probe.

11:07:14 22 Now, because the format of that probe is known in  
11:07:16 23 advance, the probe receiver has a reference to use. And  
11:07:19 24 in the patent, that's called the reference probe. And you  
11:07:22 25 see --

11:07:22 1 THE COURT: Let me interrupt, and I apologize,  
11:07:24 2 but --

11:07:25 3 MR. BENYACAR: Yes, Your Honor.

11:07:25 4 THE COURT: -- your proposal says that what is  
11:07:30 5 transmitted is a "packet." Why would "signal" not be a  
11:07:35 6 better description of what's transmitted?

11:07:37 7 MR. BENYACAR: So that might be okay. The reason  
11:07:43 8 we use "packet" is because "packet" is -- I mean, there are  
11:07:46 9 packets. I don't think "packet" is a disputed issue, but  
11:07:50 10 maybe "signal" would be better.

11:07:52 11 The --

11:07:54 12 THE COURT: Signal seems like the apples, and  
11:07:58 13 packet seems like the bag, to me.

11:08:00 14 MR. BENYACAR: Fair enough, Your Honor.

11:08:05 15 The point in dispute, though, is going to be that  
11:08:10 16 the probe has a known form that the probe receiver has in  
11:08:18 17 advance, it receives the probe, and it compares the two.  
11:08:22 18 And based on the difference, it can determine  
11:08:25 19 characteristics of the channel.

11:08:26 20 So like the patent says, and this is on Slide 101,  
11:08:30 21 the receiving node knows before reception what reference  
11:08:34 22 signal was transmitted, because it knows the form. It  
11:08:37 23 can -- by comparing the reference probe with the actual  
11:08:40 24 received probe, the receiver can determine some  
11:08:43 25 characteristics of the channel.

11:08:44 1           Okay. So that is the gist of our construction.  
11:08:53 2           That is also the plain meaning of probe. In the patent,  
11:09:01 3           probes are applicable to cable networks. They show here --  
11:09:05 4           they say in Figure 1, it can be a coaxial cable system,  
11:09:09 5           fiber cable system, an ethernet cable system. Well, probe  
11:09:15 6           has a plain meaning in the cable space.

11:09:15 7           This is -- on Slide 104. I have an excerpt from  
11:09:18 8           the DOCSIS specification, which says, the CMTS needs to  
11:09:20 9           receive a transmission with a known pattern on every  
11:09:24 10          non-excluded subcarrier. This known pattern is provided by  
11:09:28 11          probing.

11:09:30 12          It's the same thing as the patent talks about,  
11:09:35 13          and that's our construction. You get something that has  
11:09:38 14          a known pattern, you have a reference in advance, you  
11:09:42 15          compare the two, and that tells you characteristics of the  
11:09:45 16          channel.

11:09:45 17          So this is what Entropic says in their briefs  
11:09:51 18          about what I just said. They said, well, we're relying on  
11:09:56 19          what the prior art says probes are. No person of skill in  
11:10:00 20          the art would rely upon this discussion to limit the  
11:10:03 21          meaning of probe. This is in their reply brief at Page 6.

11:10:07 22          Then with respect to the DOCSIS specification,  
11:10:11 23          they say, oh, you can't rely on that. That's post  
11:10:15 24          priority. This is in the reply brief also at Page 6.

11:10:17 25          So they say you can't reference what the patent

11:10:19 1 says because that's prior art probes. You can't reference  
11:10:22 2 what DOCSIS says because that's post priority probes. So  
11:10:25 3 you can't rely on either one of those, and, yet, their  
11:10:29 4 construction is plain meaning.

11:10:31 5 THE COURT: Every construction is plain meaning in  
11:10:33 6 this particular situation as far as the Plaintiff is  
11:10:36 7 concerned.

11:10:36 8 MR. BENYACAR: Yes, true.

11:10:37 9 But you have a term that's our construction that  
11:10:42 10 has the same meaning in the prior art, it has the same  
11:10:45 11 meaning after the priority date. That's the meaning. They  
11:10:49 12 don't argue that somehow, even though it had our meaning  
11:10:53 13 before the patent and our meaning after the patent that  
11:10:55 14 somehow the patent redefined it. They're saying it's the  
11:10:58 15 plain meaning. So our construction is that plain meaning.

11:11:02 16 THE COURT: Well, if there is a plain meaning and  
11:11:04 17 that plain meaning is known in the art, why not just say,  
11:11:08 18 plain and ordinary meaning?

11:11:08 19 MR. BENYACAR: I'll tell you why not.

11:11:11 20 THE COURT: That's why I asked the question.

11:11:13 21 MR. BENYACAR: Yes.

11:11:14 22 So let me advance if I can and tell you what their  
11:11:25 23 position is.

11:11:25 24 This is what Entropic wants to tell the jury probe  
11:11:38 25 and probe request mean.

11:11:41 1 So as we just talked about, probe means it has a  
11:11:44 2 fixed pattern that you know in advance you get it and you  
11:11:48 3 compare it to a reference, and -- and that's what a probe  
11:11:51 4 is.

11:11:51 5 What they want to tell the jury, which is why they  
11:11:55 6 advocate no construction, is a probe request requests  
11:12:00 7 information that the probe receiver did not already know.  
11:12:05 8 So in the probe request, for example, I might, you know,  
11:12:08 9 ask my colleague, what's your address, because I don't  
11:12:13 10 already know it.

11:12:15 11 Then in response, the probe transmitter generates  
11:12:27 12 a probe that contains what they call responsive  
11:12:30 13 information, which the probe receiver did not already know.

11:12:34 14 So my colleague tells me, oh, I live at 112 Main  
11:12:38 15 Street, and I didn't know it before. So when they say  
11:12:41 16 plain and ordinary meaning, they intend to tell the jury it  
11:12:44 17 means something the exact opposite of what a probe is.

11:12:46 18 A probe is something you already know the format  
11:12:49 19 of, and you compare it to a reference. When they say no  
11:12:52 20 construction, what they want to tell the jury is a probe is  
11:12:55 21 new information that you never had before.

11:13:00 22 The jury cannot, in our view, be allowed to  
11:13:02 23 consider that. The jury needs to be told that -- what that  
11:13:06 24 meaning is, which is the probe has a known form that the  
11:13:11 25 receiver compares to a reference.

11:13:17 1 THE COURT: All right. What else, Mr. Benyacar?

11:13:19 2 MR. BENYACAR: That is it on probe, I believe,  
11:13:23 3 Your Honor.

11:13:23 4 THE COURT: Do you want to make an argument on  
11:13:25 5 physical layer probe --

11:13:26 6 MR. BENYACAR: Oh, I'm sorry, yes.

11:13:28 7 THE COURT: -- that's different?

11:13:32 8 MR. BENYACAR: Yes, I do.

11:13:33 9 THE COURT: I understand from the briefing you say  
11:13:34 10 it means probe; otherwise, it's indefinite.

11:13:38 11 MR. BENYACAR: Yes. So let me go to the right  
11:13:40 12 place.

11:14:00 13 The issue with physical layer probe is very  
11:14:03 14 similar to probe, which is probe had a plain meaning in the  
11:14:08 15 prior art, and in the post art. So the patent -- there's  
11:14:13 16 no dispute that the patent only discusses physical layer  
11:14:22 17 probes, and post art, post priority, this is an excerpt  
11:14:26 18 from the very same DOCSIS specification. You see in the  
11:14:29 19 color purple: A probe is a wideband physical layer signal.

11:14:35 20 Probes are physical, that's what they are. That's  
11:14:38 21 the plain meaning before the patent. The patent only  
11:14:42 22 discusses physical layer, and the DOCSIS specification  
11:14:45 23 explicitly says a probe is a wideband physical layer  
11:14:49 24 signal. That's what probes are.

11:14:50 25 So it's the same thing. The patent talks about

11:14:54 1 probes being physical layer -- post priority they're  
11:14:59 2 physical layer. They say plain meaning, but the plain  
11:15:03 3 meaning contradicts what the patent says and what the  
11:15:05 4 DOCSIS definition is.

11:15:10 5 THE COURT: All right.

11:15:10 6 MR. BENYACAR: Thank you, Your Honor.

11:15:11 7 THE COURT: Thank you.

11:15:12 8 Let me hear from the Plaintiff, please.

11:15:17 9 MR. SHIMOTA: Thank you, Your Honor. My name is  
11:15:23 10 Jim Shimota. I'll be responding to counsel and arguing  
11:15:25 11 this term.

11:15:26 12 THE COURT: Please proceed.

11:15:27 13 MR. SHIMOTA: Thank you.

11:15:28 14 So turning -- well, just straight out the bag,  
11:15:34 15 Your Honor, I agree with you a hundred percent that  
11:15:35 16 "packet" is the wrong term here.

11:15:38 17 And what counsel did not describe or discuss in  
11:15:41 18 his presentation is what they mean by "packet," right? And  
11:15:45 19 it's curiously absent from their briefing as well.

11:15:48 20 And what we think and what we can ascertain from  
11:15:51 21 their briefing is that that's just another way in which  
11:15:53 22 they're going to try to argue that the term "probe" is  
11:15:57 23 limited to a physical layer probe. And we'll get that --  
11:16:02 24 to that in a second.

11:16:03 25 But what we talked about in the '775 patent, and



11:16:08 1 Dr. Almeroth has admitted, our expert agrees, as well, that  
11:16:13 2 there is the well-known OSI model, which has multiple  
11:16:20 3 layers to it, the first of which is the physical layer.  
11:16:21 4 That's the -- that's how the -- that handles the  
11:16:24 5 modulation, how the data and the bits are transmitted.

11:16:27 6 The next layer up is the data link layer. So what  
11:16:30 7 you've heard is the MAC. Everyone knows about that too.

11:16:33 8 And there's different -- and all of these things  
11:16:35 9 can be used to describe different type of packets, correct?  
11:16:38 10 I mean, we even see every day, you know, we talk about the  
11:16:40 11 Internet. You'll hear things about TCP/IP packets. Those  
11:16:44 12 are even farther up the stack.

11:16:46 13 So we think that the issue with packet -- and  
11:16:48 14 rightly so, you pointed out the fact that we've identified  
11:16:51 15 a number of terms as being -- having their plain and  
11:16:54 16 ordinary meaning because we think there are words that the  
11:16:57 17 jury can --

11:16:58 18 THE COURT: Every one of these terms you've told  
11:17:00 19 me are plain and ordinary meaning. You haven't offered a  
11:17:03 20 specific proposal on any single term today.

11:17:03 21 MR. SHIMOTA: Okay.

11:17:06 22 THE COURT: Not that -- not that that's  
11:17:06 23 necessarily or innately wrong. It --

11:17:11 24 MR. SHIMOTA: With respect --

11:17:12 25 THE COURT: -- it leaves me a little less to work

11:17:14 1 with is all I'll say.

11:17:16 2 MR. SHIMOTA: Sure. With respect to -- and we're  
11:17:17 3 mindful of that, Your Honor. And as I was thinking about  
11:17:20 4 this yesterday, I think the word "probe" a jury would  
11:17:23 5 understand. But to the extent that you felt a claim  
11:17:25 6 construction was appropriate, I think a construction which  
11:17:29 7 would read "a signal used to determine one or more  
11:17:31 8 characteristics of a channel" would be fine. That would  
11:17:33 9 cover this situation and would work very well for this.

11:17:36 10 And the issue really -- and I will get to probe  
11:17:42 11 request eventually, right? But what they're -- what  
11:17:45 12 they're arguing is that we can't be right, we, Entropic,  
11:17:49 13 cannot be right, because we're saying that the --  
11:17:52 14 that we're saying that the probe cannot be known in  
11:17:54 15 advance. So we're saying that the -- that the signal sent  
11:17:57 16 back is not known to the receiver. That's not right.

11:17:59 17 What we will argue with respect to probe request  
11:18:03 18 is that the invention of the '690 patent deals with probes  
11:18:07 19 that are flexible, that there are a number of parameters  
11:18:10 20 that can be set by the requesting node, and it could be  
11:18:14 21 just one. It could be two. It could be three.

11:18:17 22 And so what all -- what they're arguing in their  
11:18:20 23 construction and what they're getting to eventually is that  
11:18:22 24 there needs to be a rigid probe, that the entire form must  
11:18:27 25 be known in advance, and there's just no flexibility

11:18:30 1 whatsoever. And that's what we mean when we say that the  
11:18:32 2 prior art description is wrong because that's what's  
11:18:36 3 contrasted. We don't dispute the fact that people know  
11:18:38 4 what a probe is, right? And rightly so. You say it's a  
11:18:42 5 signal.

11:18:43 6 And to the extent that the DOCSIS specification is  
11:18:46 7 not limited to physical layer probes, it's not -- I think  
11:18:52 8 the definition I proposed to you is probably better, but  
11:18:55 9 it's not particularly problematic. It's the issue as to  
11:18:59 10 whether or not they're trying to read in a physical layer  
11:19:01 11 probe, which is just wrong. It's contrary to claim  
11:19:04 12 differentiation. It's just wrong.

11:19:06 13 THE COURT: I agree with you that that physical  
11:19:10 14 layer probe is where the real rubber meets the road here.

11:19:14 15 MR. SHIMOTA: Yeah, okay. So moving forward then,  
11:19:16 16 I think one thing that you've highlighted -- I guess we've  
11:19:21 17 already skipped over that -- is the fact that there's a  
11:19:25 18 number of arguments today, the gist of which are, well, the  
11:19:28 19 specification only discloses one embodiment, Your Honor.  
11:19:31 20 And as a consequence of that, if you don't construe the  
11:19:35 21 claim as limited to that embodiment, then it's -- then it's  
11:19:39 22 just indefinite.

11:19:40 23 And I think you've hit the nail perfectly on the  
11:19:43 24 head that to the extent that that argument has any legs --  
11:19:46 25 and I'm here to tell you that it doesn't, right, precisely

11:19:49 1 because the OSI model was so well-known at that time, but  
11:19:52 2 if it has any legs, that's an argument for summary judgment  
11:19:55 3 on written description, that if they're arguing that the  
11:20:00 4 particular PHY layer probe is the only embodiment in the  
11:20:04 5 specification and then that where we shouldn't be allowed  
11:20:08 6 to claim so broadly, that's a written description argument.  
11:20:11 7 It's not an indefiniteness argument.

11:20:13 8 One of ordinary skill in the art looking at the  
11:20:16 9 claim language as written would see in Claim 9 a physical  
11:20:21 10 layer probe, and then looking at Claim 1 would see a probe,  
11:20:23 11 and that would clearly convey to an ordinary artisan that  
11:20:24 12 the probe in Claim 1 is broader. It is not limited to the  
11:20:28 13 physical layer.

11:20:28 14 And in that event, then, later on an ordinary  
11:20:33 15 artist would look to see, well, is there description which  
11:20:36 16 corresponds with a probe more than the physical layer? We  
11:20:40 17 say there is. We would say an ordinary artist would know  
11:20:43 18 that based upon the description in the patent.

11:20:45 19 They may dispute that. We may get to that later.  
11:20:47 20 But in terms of construing the claims as written, we think  
11:20:50 21 it's a very simple straightforward task. To the extent  
11:20:54 22 that Your Honor wants to construe the probe, I think the  
11:20:58 23 construction that I've identified now would work for us.  
11:21:02 24 But, otherwise, I agree. This is a pretty simple dispute,  
11:21:05 25 which I will therefore sit down unless you have further

11:21:08 1 questions for me.

11:21:08 2 THE COURT: No, I think I understand your  
11:21:11 3 position. Thank you, Counsel.

11:21:13 4 MR. SHIMOTA: Thank you very much, Your Honor.

11:21:14 5 THE COURT: Anything briefly from the Defendant  
11:21:16 6 before we move on?

11:21:17 7 MR. BENYACAR: Yes, Your Honor.

11:21:21 8 We don't dispute that the OSI model has different  
11:21:25 9 layers. But he hasn't shown anything which shows that  
11:21:30 10 probes are anything other than the physical layer. Yes,  
11:21:33 11 there are other layers of the stack. Probes exist at the  
11:21:35 12 physical layer.

11:21:36 13 And you I believe just heard counsel say what I  
11:21:42 14 said, which is the prior art definition is wrong, and the  
11:21:45 15 post definition is wrong, that somehow the patent has some  
11:21:49 16 new meaning of probe.

11:21:51 17 But they didn't offer it, and as we're going to  
11:21:54 18 talk about when we talk about probe request, the invention  
11:21:59 19 is not a new probe. The invention is what this -- what the  
11:22:04 20 title of the patent is, which is receiver-determined probe.  
11:22:08 21 It's not changing what a probe is.

11:22:10 22 What it does is it says, well, probes were  
11:22:12 23 predetermined in the prior art. So if you were to send me  
11:22:16 24 a probe, you would send it, and I would just know what form  
11:22:19 25 it was supposed to be.

11:22:20 1 In the invention, I would tell you: Send me a  
11:22:24 2 probe which has this form. And then you would send it to  
11:22:28 3 me, and I would do the comparison. That's the invention.  
11:22:30 4 It's not -- the invention is not a new probe.

11:22:32 5 THE COURT: Tell me -- tell me specifically where  
11:22:36 6 there is support for the notion that a probe must be a  
11:22:39 7 physical layer probe. I don't find any general statement  
11:22:43 8 in the intrinsic record or clear linkage here. But you've  
11:22:48 9 obviously told me that it's either probe or it's  
11:22:52 10 indefinite.

11:22:53 11 Let's assume I don't think it's indefinite.  
11:22:55 12 Where is there support for probe being limited to a  
11:23:02 13 physical layer probe?

11:23:03 14 MR. BENYACAR: So the specification does not say a  
11:23:06 15 probe must be a physical layer probe. What the  
11:23:09 16 specification describes is physical layer probes.

11:23:12 17 We're not saying and this is not a single one of  
11:23:18 18 our argument, oh, well, it's -- you know, the term can  
11:23:21 19 only be what the specification says. We're not saying  
11:23:26 20 that.

11:23:26 21 What I put up before is a definition from the  
11:23:28 22 DOCSIS specification which says a probe is a physical layer  
11:23:35 23 signal.

11:23:35 24 THE COURT: But how does it being a physical layer  
11:23:38 25 signal -- well, that seems to me to be a statement as to a

11:23:53 1 specific feature rather than equating probe with physical  
11:23:58 2 layer probe.

11:24:00 3 But let me -- let me ask it this way. Other than  
11:24:03 4 what you've cited from the DOCSIS specification, do you  
11:24:06 5 have additional support for your position?

11:24:07 6 MR. BENYACAR: Only that the only probes discussed  
11:24:10 7 in the patent are physical layer, and probe has a plain  
11:24:13 8 meaning in the art, which I'm showing, which is it is a  
11:24:16 9 physical layer.

11:24:16 10 THE COURT: Okay. Thank you.

11:24:19 11 MR. BENYACAR: Thank you, Your Honor.

11:24:20 12 THE COURT: All right. Let's move on to "probe  
11:24:27 13 request," also from the '690 patent.

11:24:28 14 Mr. Benyacar, you're at the podium, or you were.  
11:24:35 15 Let me hear from you on this.

11:24:37 16 MR. BENYACAR: I'm back.

11:24:38 17 Now, Your Honor, you remember I said a minute ago  
11:24:56 18 that the invention is not changing what a probe is. Probe  
11:25:01 19 has the same meaning it had in the prior art and post art.

11:25:05 20 This is what the invention is. I'm on Slide 1 --  
11:25:09 21 110 now. Requiring the transmitting node to send  
11:25:13 22 predetermined probe reduces the amount of flexibility in  
11:25:18 23 the characterization process.

11:25:19 24 So, in other words, if you were going to send me a  
11:25:22 25 probe, that probe form is fixed, or you would only have

11:25:26 1 some fixed options, and you would use one of those, and I  
11:25:28 2 would know what you're sending. And according to the  
11:25:30 3 patent, the fact that you had to send me a predetermined  
11:25:35 4 probe was the problem.

11:25:36 5 And that's where the alleged invention comes in.  
11:25:44 6 This is the title of the patent. This is the alleged  
11:25:47 7 invention. A receiver determined probe. Not a new probe,  
11:25:52 8 not probe means something else. It's a receiver determined  
11:25:56 9 probe, which means if I receive the probe, you're not just  
11:25:59 10 going to send me some predefined pattern. I'm going to  
11:26:03 11 tell you what pattern I want, and then you're going to send  
11:26:06 12 it to me.

11:26:07 13 Now, I know I told -- I told you what to send me,  
11:26:08 14 so when you send it, I'll compare it to what you told me --  
11:26:11 15 what I told you to send, and that's how I'll characterize  
11:26:15 16 the channel.

11:26:16 17 This is from the patent. The receiving node may  
11:26:23 18 generate a probe request that specifies a plurality of  
11:26:26 19 parameters which dictate the form of the probe. Generate a  
11:26:34 20 probe having the form specified by these parameters. Not a  
11:26:38 21 new probe. I send you parameters, and then you send me a  
11:26:41 22 probe that has the form that I told you to send. That's  
11:26:45 23 the invention, the alleged invention.

11:26:48 24 Accordingly, the probe request specifies a  
11:26:53 25 plurality of parameters associated with a generation and



11:26:56 1 transmission of a probe, including the content payload of  
11:26:59 2 the probe.

11:27:00 3 Now, remember, probe request is the invention,  
11:27:05 4 right? Theoretically, this didn't exist before. Before,  
11:27:09 5 they were all predetermined. Now, you can send a probe  
11:27:12 6 request that -- where I can tell you what I want the form  
11:27:15 7 to be. And this is where the patent tells you what that  
11:27:18 8 is.

11:27:18 9 Column 2, Lines 3 through 9, are critical. It's  
11:27:29 10 this new thing they invented called the receiver determined  
11:27:33 11 probe with a probe request, and here it's telling you what  
11:27:36 12 it is.

11:27:36 13 Now, this says that the probe request includes the  
11:27:39 14 content payload of the probe. Undoubtedly, it can include  
11:27:43 15 other things. And after that passage, it goes on and says:  
11:27:47 16 In one embodiment, the parameters further include, in  
11:27:50 17 addition to the content payload, and then it lists a bunch  
11:27:53 18 of things.

11:27:54 19 And when it's done listing all those things, it  
11:27:57 20 says: Accordingly -- or in other words -- the probe that  
11:27:59 21 is transmitted in response to the probe request will have a  
11:28:02 22 form dictated by the parameters specified in the probe  
11:28:06 23 request.

11:28:06 24 That's what a probe request is.

11:28:10 25 THE COURT: I'm curious where you're -- I'm

11:28:12 1 curious about your use of the phrase "content payload." I  
11:28:17 2 mean, up until now, you've argued about the form of the  
11:28:20 3 probe. Somehow we seem to be morphing from form of the  
11:28:26 4 probe to content payload.

11:28:27 5 MR. BENYACAR: Yes.

11:28:27 6 THE COURT: They're not synonymous, are they?

11:28:29 7 MR. BENYACAR: No, they're not. But the content  
11:28:31 8 payload is a form parameter.

11:28:33 9 So in a packet, and these are packets, again, we  
11:28:35 10 talked about this a minute ago, the entire specification is  
11:28:38 11 in the context of a packet. A packet has a payload. It  
11:28:42 12 has a header, and it has a payload, which is the actual  
11:28:45 13 information that you want to transmit.

11:28:47 14 What this is saying is the form -- the parameters  
11:28:54 15 include at least what that content payload should be. It  
11:28:57 16 can have many other things, but what the content payload of  
11:29:00 17 the packet is, that's mandatory.

11:29:05 18 THE COURT: All right.

11:29:07 19 MR. BENYACAR: And the reason for that, of course,  
11:29:08 20 is that's where you're -- that's where you're going to find  
11:29:11 21 that fixed pattern that you're going to do the comparison  
11:29:14 22 to, right? So you have to include that.

11:29:16 23 But you can include a bunch of other things. But  
11:29:21 24 all of those other things constitute the form. And you  
11:29:26 25 notice that in the excerpt from the patent at 2:3-9, you

11:29:38 1 notice that the word "form" is in quotes. Well, "form" is  
11:29:42 2 a plain English word. Why did they put it in quotes?  
11:29:42 3 Well, because they're telling you what we mean by "form"  
11:29:42 4 here.

11:29:46 5 I'm going to send parameters. It'll include at  
11:29:49 6 least a content payload, but it can include other things.  
11:29:52 7 But if there are things you use to generate or transmit  
11:29:56 8 the probe, those -- that's the form. And it goes on to  
11:29:59 9 list a bunch of things. And it repeatedly says those are  
11:30:03 10 form.

11:30:11 11 This is -- this is the disclosed embodiment, and  
11:30:13 12 this is how the patent describes how the disclosed  
11:30:18 13 embodiment works. This is Figure 4, that probe receiver  
11:30:23 14 transmits a probe request specifying probe parameters to  
11:30:28 15 one or more -- to the node that will transmit the eventual  
11:30:31 16 probe having a form that is dictated by the specified  
11:30:34 17 parameters. This is at Slide 115.

11:30:39 18 The receiver of the probe sends a probe request,  
11:30:41 19 it has parameters, and the receiver of the probe request  
11:30:44 20 generates the probe having the form specified by those  
11:30:48 21 parameters.

11:30:48 22 Then the probe transmitter on Slide 116 receives  
11:30:56 23 that probe request. What does it do? In block 1 -- 202,  
11:31:00 24 the probe transmitter uses the specified probe parameters,  
11:31:04 25 those that came in the probe request, to generate a probe

11:31:07 1 having a form that complies with the specified parameters.

11:31:10 2 By the way, you notice there's nothing new about  
11:31:13 3 what a probe is here. It's all that it's -- that -- about  
11:31:16 4 how the probe gets generated with information in the probe  
11:31:19 5 request.

11:31:20 6 The probe transmitter then sends that probe, and  
11:31:25 7 the probe receiver uses it to determine the characteristics  
11:31:30 8 of the channel. That's how the disclosed embodiment works.

11:31:33 9 Our construction tracks what the specification  
11:31:36 10 says is this new thing called a probe request. That's the  
11:31:41 11 invention. It's sent by a first node to a second node,  
11:31:46 12 which defines the form of a probe to be generated and  
11:31:50 13 transmitted by the second node. The probe request  
11:31:53 14 specifies at least the content payload of the probe.

11:31:55 15 That comes exactly from the definition -- from the  
11:31:59 16 description of this new thing called a probe request that's  
11:32:03 17 the invention of this patent. And I'm -- we take it right  
11:32:06 18 from Column 2, Lines 3 through 9.

11:32:09 19 THE COURT: So why is importing -- excuse me, why  
11:32:12 20 is tracking the specification not akin to importing a  
11:32:16 21 limitation into the claims?

11:32:18 22 MR. BENYACAR: Because it's a new thing. It's a  
11:32:20 23 new thing. It didn't exist before.

11:32:23 24 You've invented something called the probe  
11:32:25 25 request. So what they want to say is, well, plain meaning.

11:32:29 1 Let's look at what the plain meaning would be. They say,  
11:32:32 2 oh, well, it just means send me a probe. It's a probe  
11:32:35 3 request.

11:32:36 4 That's not the invention. The invention is tell  
11:32:39 5 you what form I need the probe in and send it back. You're  
11:32:43 6 not allowed to read claims that way, particularly not when  
11:32:46 7 it's the invention.

11:32:48 8 So according to their plain meaning, probe request  
11:32:51 9 just means request a probe. What that means is I could  
11:32:54 10 just say send me a probe, and you send me one. Nothing  
11:32:57 11 about specifying the form, nothing about sending  
11:33:02 12 parameters, nothing about the content payload. It's not  
11:33:05 13 what the invention is.

11:33:06 14 This is what they say. A person of skill in the  
11:33:12 15 art would understand that the point of the probe request is  
11:33:14 16 for a node to generate a probe containing responsive  
11:33:17 17 information. That's what we went over before. This is  
11:33:20 18 what they -- this is what they want to tell the jury, that  
11:33:25 19 a probe request -- as opposed to what we say and what the  
11:33:29 20 specification says, which is it defines parameters, they  
11:33:33 21 want to tell the jury, I asked you for your address, which  
11:33:36 22 I didn't know before. That's the probe request. That's  
11:33:38 23 not the invention.

11:33:38 24 And probe request cannot be construed by combining  
11:33:47 25 its two constituent words. We have here, you know, the

11:33:52 1 Network Commerce case where the Federal Circuit said you  
11:33:55 2 can't just look at download component and say you're  
11:33:59 3 downloading a component because the term didn't have a  
11:34:02 4 dictionary definition. And the specification makes clear  
11:34:05 5 that the download component must include a boot program.

11:34:09 6 Here, it's not only the specification says what it  
11:34:15 7 is, the probe request is the whole invention. And what  
11:34:19 8 they want to do is say, well, plain meaning for something  
11:34:22 9 that's the invention. The whole invention is a receiver  
11:34:25 10 determined probe and the probe request. You have to look  
11:34:28 11 to the specification to see what it is. That's the  
11:34:31 12 invention.

11:34:33 13 THE COURT: All right.

11:34:38 14 MR. BENYACAR: Okay. Thank you, Your Honor.

11:34:39 15 THE COURT: Thank you, Counsel.

11:34:41 16 Let me hear from Plaintiff.

11:34:50 17 Is probe request the whole invention?

11:34:52 18 MR. SHIMOTA: Well, the invention is a  
11:34:57 19 receiver-defined probe. And so where they -- where they go  
11:35:00 20 completely off the rails here again, Your Honor, is that,  
11:35:03 21 you're right, they're reading in a particular embodiment  
11:35:05 22 into the claim.

11:35:06 23 I mean, if you look at their proposed  
11:35:08 24 construction, their construction includes the word  
11:35:10 25 "request." So by -- just on its face, they don't -- that

11:35:13 1 they -- they're going to tell the jury that we all know  
11:35:15 2 what the word "request" means, and we just talked about  
11:35:17 3 what a "probe" means. So you could simply say, you know,  
11:35:21 4 whatever definition of probe you want, and add a request  
11:35:24 5 for whatever that definition is here.

11:35:25 6 But what -- the trick they try to pull is that  
11:35:28 7 they say that, well, the invention is a flexible probe, but  
11:35:33 8 we're going to make it a little bit inflexible by always  
11:35:36 9 saying that the 1s and 0s need to be specified. The  
11:35:40 10 content of the payload, right?

11:35:43 11 And the patent is -- it goes exactly contrary to  
11:35:45 12 that. It says that we're going to ask for a probe. A  
11:35:48 13 receiver is going to say I'm interested in some  
11:35:51 14 characteristic of the channel. I might -- if I'm the  
11:35:54 15 receiver, I might be interested in the transmission power.  
11:35:58 16 I could care less about the content of the probe. All I  
11:36:00 17 want is to know to send a probe request where you send back  
11:36:04 18 a probe at a particular transmission power, agnostic about  
11:36:07 19 the 1s and 0s, and the probe comes back, and you can  
11:36:10 20 compare the transmission power from what you thought you  
11:36:14 21 were going to get to what actually came and so you could  
11:36:17 22 see the loss.

11:36:18 23 I don't care at all about the content, right? And  
11:36:20 24 the patent is very, very clear about that.

11:36:22 25 What they're trying to get you to do is take a

11:36:24 1 simple word, "request," we've already talked about "probe,"  
11:36:30 2 and read in a particular embodiment. And I'm going to go  
11:36:35 3 on to explain exactly that's wrong.

11:36:36 4 We've talked about the description of a probe in  
11:36:40 5 the -- in the specification. It says a probe -- that the  
11:36:44 6 receiving node may generate a probe request that specifies  
11:36:48 7 a plurality of parameters to be used in such a  
11:36:52 8 receiver-determined probe to generate a probe having the  
11:36:54 9 form specified by these parameters.

11:36:56 10 That's just a general description of what a probe  
11:37:00 11 is. In their briefing, they seem to imply that there's  
11:37:04 12 some kind of a definition which narrows the scope of what  
11:37:07 13 these words mean. I didn't hear anything about a  
11:37:09 14 definition today, and, in fact, there is one. It defies  
11:37:14 15 credulity to say that there's anything close to a clear and  
11:37:18 16 unambiguous definition in this patent at all.

11:37:20 17 And they point to one section of it where they  
11:37:24 18 find the language that provides for the content payload  
11:37:30 19 that they try to say is mandatory. But if you look in the  
11:37:34 20 brief summary of the invention, where you're looking at,  
11:37:37 21 and this is at 1 -- yeah, starting at 164 to 242 of the  
11:37:41 22 patent, it talks about various embodiments of this  
11:37:45 23 receiver-defined probe.

11:37:46 24 And if you look, you know, to the bottom of what  
11:37:50 25 we have highlighted, it provides -- and this is something



11:37:54 1 that doesn't show up in their brief, it provides: In a  
11:37:57 2 further embodiment of the method and apparatus, at least  
11:38:00 3 one of the probe parameters indicates -- and then they list  
11:38:04 4 off the seven -- seven examples. These aren't even all the  
11:38:08 5 parameters that you could use for the form of the probe.  
11:38:10 6 But there are just seven examples. And one of the examples  
11:38:14 7 at B is the payload content of the probe.

11:38:17 8 So what that's telling you is that you can use one  
11:38:19 9 of those, but you certainly don't need to use all of them,  
11:38:22 10 and it absolutely is not mandatory that you need to have  
11:38:25 11 the content of the probe specified in every particular  
11:38:31 12 probe request.

11:38:31 13 You've hit the nail on the head that they're  
11:38:33 14 trying to read in an embodiment into the claim when the  
11:38:36 15 words are very clear themselves.

11:38:38 16 And this -- just to underscore that fact, another  
11:38:43 17 embodiment in the specification, what they're trying to  
11:38:45 18 tell you is that every time you send a probe, the receiver  
11:38:49 19 needs to say, I want a particular number of 1s and 0s.  
11:38:53 20 They're going to convey that particular information to me,  
11:38:57 21 the content of -- there needs to be content.

11:38:59 22 Well, what the specification describes at  
11:39:01 23 Column 9, 55 to 63, is a very, very simple probe that  
11:39:06 24 contains no information or content. What it says is in  
11:39:11 25 some alternative embodiments, the probe requests specify

11:39:15 1 time-domain probes.

11:39:17 2 For example, a probe request may specify a  
11:39:20 3 time-domain probe to generate a square wave or other easily  
11:39:25 4 analyzed signal for channel estimate purposes.

11:39:27 5 So what this is talking about there, you see that  
11:39:30 6 square wave, in order for there to be information, content  
11:39:33 7 to be conveyed, there needs to be a wave that's moving  
11:39:37 8 around. It needs to be modulated. A square wave itself  
11:39:41 9 carries no information whatsoever. There's no content.

11:39:44 10 And in this scenario, this particular probe is one  
11:39:49 11 example of something you could use for -- it's a very  
11:39:50 12 simple wave to see if there is reflections in the channel  
11:39:53 13 or some type of interference.

11:39:55 14 And so this is just another example of the many  
11:39:58 15 different types of probes that are described and disclosed  
11:40:00 16 in the patent which are not consistent with the definition  
11:40:06 17 that they're providing, kind of the mandatory and flexible  
11:40:11 18 probe that must always have a content payload specified.

11:40:14 19 And then just -- you know, just -- lastly, you  
11:40:20 20 know, there are a number of -- as we've described in our  
11:40:23 21 briefing, there are a number of different types of  
11:40:26 22 parameters that can be used to specify the form of the  
11:40:28 23 probe, one of which obviously is the payload content of the  
11:40:32 24 probe. We've talked about that a lot, but there are  
11:40:35 25 others.

11:40:35 1           There are the number of symbols. You know, it's  
11:40:38 2 not just how much information, the number of 1s and 0s.  
11:40:41 3 You could ask for 10 symbols or 8 symbols. You can vary it  
11:40:47 4 every time and be agnostic as to what those symbols carry,  
11:40:50 5 but just rather, you know, how the network -- how things  
11:40:51 6 are performed.

11:40:52 7           These are all the types of things that form  
11:40:55 8 parameters that can be varied but don't need to. You only  
11:40:56 9 need to use one, and that's the whole point of the  
11:40:59 10 invention, that the receiver needs to have the flexibility  
11:41:01 11 to be able to determine what its interest and -- rather  
11:41:05 12 than being locked down to a particular type of probe.

11:41:08 13           So with that, unless you have further questions,  
11:41:13 14 that is my presentation on this element, Your Honor.

11:41:16 15           THE COURT: I don't think I have additional  
11:41:17 16 questions. Thank you.

11:41:19 17           MR. SHIMOTA: Thank you, Your Honor.

11:41:25 18           THE COURT: Okay. Let's go on, and we'll take up  
11:41:32 19 "generating the probe in accordance with the first  
11:41:35 20 plurality of parameters" in Claim 1 of the '690. We'll  
11:41:40 21 also take up "wherein the probe is generated" from Claim 9  
11:41:44 22 of the '690. And we'll take up "the first plurality of  
11:41:49 23 probe parameters comprising," which also comes from Claim 9  
11:41:54 24 of the '690.

11:41:55 25           Defendant argues this is indefinite. Plaintiff

11:41:59 1 argues it's plain and ordinary meaning.

11:42:01 2 Let me hear from the Plaintiff on this first, and  
11:42:06 3 then I'll hear from the Defendant.

11:42:07 4 MR. SHIMOTA: Thank you, Your Honor.

11:42:13 5 As you correctly noted, I mean, there's an up and  
11:42:21 6 down choice on this. It's either there's -- the claims  
11:42:25 7 survive, or they're indefinite. There's no --

11:42:26 8 THE COURT: It's a wide gulf.

11:42:29 9 MR. SHIMOTA: There is a wide gulf.

11:42:30 10 But Charter's argument, I mean, they don't --  
11:42:33 11 Charter isn't saying it doesn't understand what these words  
11:42:36 12 mean. I mean, that should be clear from the briefing.  
11:42:39 13 Rather, what they're saying, again, it's another species of  
11:42:41 14 their -- a type of 112 written description argument, which  
11:42:45 15 frankly is wrong for reasons I'll tell you.

11:42:47 16 But their definiteness argument rests on the  
11:42:50 17 premise -- because what these claims are -- what their  
11:42:52 18 problem is, is they're saying that the patent describes a  
11:42:56 19 receiver-defined probe, which -- the form of which is  
11:42:59 20 defined by a first plurality of probe parameters.

11:43:04 21 And they say the claim goes on to describe the  
11:43:07 22 second plurality of parameters -- none of them, right? And  
11:43:07 23 so because there's no description of these second plurality  
11:43:11 24 of parameters, then the claims must be indefinite, you  
11:43:11 25 know.

11:43:17 1 Again, I think just the claims on their face given  
11:43:20 2 that there's no dispute as to what the words mean, to the  
11:43:23 3 extent they have an argument, it's one that they should  
11:43:25 4 make on summary judgment for written description. But I'll  
11:43:28 5 explain to you why that that summary judgment, when it  
11:43:31 6 eventually comes, is going to fail.

11:43:33 7 First, the specification is super clear that while  
11:43:38 8 the receiver-defined -- defines at least one probe  
11:43:43 9 parameter, the transmitter can also define other  
11:43:48 10 parameters, depending on information known at the  
11:43:51 11 transmitter.

11:43:52 12 And I'll show you that's where in the  
11:43:54 13 specification, but that would be the scenario where, for  
11:43:56 14 example, the receiver might say, I want a probe that has a  
11:43:59 15 particular content to it, right? I want to know the 1s and  
11:44:06 16 0s. And it sends that form -- a probe request like that to  
11:44:07 17 the transmitter. The transmitter knows that the channel is  
11:44:11 18 poor for whatever reason. So the transmitter says, well,  
11:44:14 19 I'm going to send back the probe with the content  
11:44:16 20 requested, but I'm also going to turn up the transmission  
11:44:19 21 power. So I make sure that that probe gets back to the  
11:44:22 22 receiving node. And I'll show you where the specification  
11:44:25 23 says that.

11:44:25 24 And there's also -- and the other point in their  
11:44:30 25 briefing is that, well, there are -- the only parameters

11:44:32 1 that could relate to a probe are ones relating to its form.  
11:44:38 2 And they say, well, because there's only -- that those must  
11:44:41 3 be specified by the first set of parameters, and there's  
11:44:43 4 nothing else there could be.

11:44:44 5 Well, the specification describes that there are  
11:44:47 6 other parameters other than so-called form parameters.  
11:44:51 7 They specify time, the time that the transmitter can send  
11:44:54 8 the probe back, and they also specify the destination of  
11:44:57 9 when the probe can come back. And so both of which are  
11:45:00 10 neither form parameters.

11:45:01 11 So the written description-type argument that  
11:45:04 12 Charter advances here is just -- it's wrong on its face as  
11:45:07 13 a matter of law, and it's also wrong as a matter of fact.  
11:45:10 14 And let me show you why.

11:45:12 15 So if you look to Column 6, Lines 33 to 47, of the  
11:45:19 16 specification, it states there: Alternatively, the probe  
11:45:25 17 transmitter can transmit the probe to any other probe  
11:45:30 18 base based upon one of the parameters of the probe request  
11:45:32 19 or based upon information that previously existed within  
11:45:35 20 the transmitting node.

11:45:36 21 This is a very clear disclosure of the fact that a  
11:45:41 22 transmitter -- the transmitter of the probe can receive a  
11:45:46 23 probe request that has -- you know, that specifies what the  
11:45:49 24 form needs to look like.

11:45:50 25 But if the transmitter knows things that will help

11:45:54 1 the information -- it can -- for example, the example I  
11:45:57 2 gave before, the probe request could say I want a  
11:46:00 3 particular -- the receiving node could say I want a  
11:46:04 4 particular cyclic prefix. It could go to the transmitting  
11:46:07 5 node, the transmitting node again could say I think there's  
11:46:10 6 problems in the channel. I think there's interference. So  
11:46:13 7 I'm going to transmit -- I'm not going to transmit the  
11:46:16 8 probe back not once but twice to make sure that the  
11:46:20 9 receiving node will get it. The number of times a probe  
11:46:23 10 can be transmitted is another form parameter.

11:46:25 11           These are just examples of the ways in which this  
11:46:26 12 system can operate such that the receiver is allowed to  
11:46:31 13 define probes flexibly, but, nevertheless, the transmitting  
11:46:35 14 node can also have a part, have intelligence so the system  
11:46:39 15 works better in the process of this -- the probe -- the  
11:46:44 16 inventive -- the inventive probes in the patent.

11:46:46 17           And turning to the next portion of their argument  
11:46:53 18 that they're -- that they're -- there just simply are no  
11:46:57 19 parameters for probes that are other than form parameters,  
11:47:01 20 well, they're wrong, and the specification says that.

11:47:03 21           The specification first provides that there's --  
11:47:08 22 you can have a different destination address for a probe.  
11:47:10 23 And this is a situation where a network operator someplace  
11:47:14 24 else says, well, I want node -- the receiving node, I want  
11:47:18 25 Node 1 to send a request to Node 3, and it's going to have

11:47:23 1 a specific form, but I want that probe to go to a different  
11:47:28 2 address, back to the administrator there.

11:47:31 3 And so in that instance, the transmitter is going  
11:47:34 4 to have to put an address on where this probe is going to  
11:47:38 5 go. The destination address is not one of the form  
11:47:41 6 parameters, but it nevertheless is a parameter.

11:47:44 7 A kind of a simple example for this is like if you  
11:47:46 8 were going to buy a new car, Your Honor, right, and you  
11:47:49 9 came and said, I want this particular engine, I want these  
11:47:53 10 particular wheel rims, and I want this particular color of  
11:47:56 11 my car, well, those are form parameters you can order.

11:47:58 12 Maybe the dealer might specify other aspects of  
11:48:00 13 the car you don't want. But ultimately, you could specify,  
11:48:05 14 well, where's my car going to go? Here's my address.  
11:48:07 15 That's not a form parameter. And when is it -- when is  
11:48:10 16 going to arrive at my house? Is it going to arrive in a  
11:48:14 17 month? Is it going to arrive in a year? That's another  
11:48:14 18 parameter which can be specified by the transmitter, the  
11:48:16 19 dealership in this example, both of which are described in  
11:48:19 20 the specification.

11:48:20 21 Let me take you to the time. You know, and then  
11:48:24 22 aside from -- as I just said, aside from the destination  
11:48:26 23 address, there are parameters aside from form. Explicit --  
11:48:29 24 you know, it's kind of obvious. We thought it was obvious,  
11:48:32 25 but we want to be -- just be clear to the Court that



11:48:34 1 they're also described in the specification.

11:48:36 2           And if you look at the '690 patent, at Column 6,  
11:48:40 3 Lines 34 -- 33 to 45, it says that in Block 203, you see  
11:48:46 4 that in -- there's an error in there -- there's an error in  
11:48:50 5 this section of the patent, Your Honor. It refers to  
11:48:52 6 Figure 5, but what it's meant to be is Figure 4, and you  
11:48:56 7 can -- that's clear from the numerals, right?

11:48:59 8           But it's providing that in Block 203, the probe  
11:49:05 9 transmitter transmits the generated probe to the probe  
11:49:09 10 requester at a specified time. So this is describing, you  
11:49:12 11 know, the transmission side of it. And you've got the  
11:49:15 12 probe transmitter, and the probe transmitter and -- it can  
11:49:18 13 decide, well, I'm going to send it in two seconds or an  
11:49:21 14 hour, or, you know, it can make -- it's using its  
11:49:24 15 intelligence so that it's -- so the system works, and  
11:49:24 16 that's another parameter. Time is not a form. It doesn't  
11:49:29 17 relate to what the probe, the contents, or the preamble or  
11:49:31 18 anything like that, but nevertheless is a particular  
11:49:34 19 parameter that is specified.

11:49:36 20           So, ultimately, the -- Charter is just wrong.  
11:49:43 21 They're wrong that the supposed lack of written description  
11:49:47 22 renders these claims -- the claims that nobody disputes  
11:49:50 23 they know how they work, renders them indefinite, and  
11:49:52 24 they're wrong as a matter of fact that the transmitter  
11:49:57 25 can't set form parameters, and there aren't parameters

11:50:00 1 other than forms specified in the patent specification.

11:50:02 2 And as a consequence of that, I think there are --  
11:50:06 3 they haven't carried their burden of showing the clear and  
11:50:09 4 convincing evidence burden that the patents are indefinite,  
11:50:12 5 and that the language, which nobody disputes is clear on  
11:50:14 6 its face would be understandable to a jury should be  
11:50:17 7 presented.

11:50:18 8 So with that, I thank you for your time, Your  
11:50:21 9 Honor, unless you have further questions.

11:50:22 10 THE COURT: All right. Thank you, Counsel.

11:50:23 11 Let me hear from Charter in response.

11:50:24 12 MR. BENYACAR: So everything counsel just said  
11:50:46 13 about the difference between a form parameter and a  
11:50:53 14 non-form parameter is nowhere in the specification. You  
11:50:55 15 will not find anywhere in this specification where it says,  
11:50:59 16 oh, well, this means form and this means doesn't. Or this  
11:51:02 17 is a form parameter or this isn't.

11:51:04 18 That's completely counsel argument that he doesn't  
11:51:07 19 have a single cite for because the specification does not  
11:51:11 20 distinguish form parameters from not form parameters.  
11:51:15 21 Doesn't exist.

11:51:15 22 As we just saw, the patentee put "form" in quotes  
11:51:19 23 because if they're parameters, particularly parameters that  
11:51:21 24 are used to generate, which is what this claim is about, so  
11:51:25 25 even putting aside from the fact that this idea that the

11:51:28 1 patent somehow distinguishes form from not form, it's  
11:51:32 2 nowhere. It's nowhere.

11:51:33 3 So when counsel says, oh, well, time, that's not  
11:51:36 4 form, that's his opinion. The patent doesn't say anything  
11:51:39 5 about that. It describes all the parameters as being form  
11:51:43 6 parameters.

11:51:43 7 So in this case, with respect to this particular  
11:51:49 8 term, this relates -- this -- these claim terms relate to  
11:51:55 9 generating. So what the claim requires -- and we'll use --  
11:52:01 10 you know, the arguments are the same for both. So for  
11:52:04 11 simplicity, we'll use the language for the '690 patent.

11:52:06 12 The '690 patent requires generating the probe in  
11:52:10 13 accordance with the first plurality of parameters and the  
11:52:13 14 second plurality of parameters. Those are the  
11:52:15 15 parameters -- the first plurality is sent in the probe  
11:52:18 16 request, the second plurality is what theoretically the  
11:52:23 17 probe transmitter knows, but wherein the probe has a form  
11:52:28 18 that's dictated by the first plurality of parameters.

11:52:32 19 So I don't know why counsel is saying this is a  
11:52:34 20 written description argument. It's not a written  
11:52:38 21 description argument. It's an argument that you can't  
11:52:41 22 generate a probe in a way that doesn't have anything to do  
11:52:44 23 with its form. It doesn't even make sense as a matter of  
11:52:48 24 English. Certainly there's nothing in the patent that  
11:52:51 25 draws that distinction.

11:52:52 1 So here's what there's no disclosure in the  
11:53:01 2 specification of, which is why the claims come out of  
11:53:04 3 nowhere. This is not written description. This is why  
11:53:07 4 we -- there is actually no way to do it because the  
11:53:09 5 specification doesn't tell you how. So, in other words,  
11:53:12 6 I'm not arguing, well, it's not in the spec. I'm saying  
11:53:14 7 it's not in the spec because it doesn't make any sense.

11:53:16 8 So what they're saying is you get the first  
11:53:22 9 parameters, and instead of generating the probe, you  
11:53:25 10 determine a second plurality of parameters at the probe  
11:53:29 11 transmitter. And then what you do is you generate the  
11:53:32 12 probe in accordance with the first and second parameters,  
11:53:35 13 but the form can be dictated only by the first parameters.

11:53:38 14 That concept is nowhere in the specification. The  
11:53:44 15 specification doesn't distinguish between form and non-form  
11:53:47 16 parameters. And it doesn't disclose generating a probe --  
11:53:51 17 you generate it based on two different pluralities, but a  
11:53:56 18 form is only on the first plurality.

11:53:59 19 That concept is not in the patent. So you can't  
11:54:01 20 look at the patent to say, oh, well, let me see if I can  
11:54:04 21 understand what it means. That idea is not in the patent.  
11:54:06 22 It's not a written description argument. It's that the  
11:54:10 23 specification is going -- not going to help us figure it  
11:54:11 24 out.

11:54:11 25 Here's what the patent says. This is the key

11:54:18 1 language: The receiving node may generate a probe request  
11:54:22 2 that specifies a plurality of parameters to be used in such  
11:54:26 3 a receiver determined probe to generate a probe having the  
11:54:30 4 form specified by these parameters. Accordingly, the probe  
11:54:35 5 request specifies a plurality of parameters associated with  
11:54:39 6 the generation and transmission of a probe.

11:54:42 7 The form parameters are associated with the  
11:54:45 8 generation and transmission of a probe. Nowhere here does  
11:54:48 9 it say, oh, well, here are some non-form parameters you can  
11:54:52 10 use. They're all form.

11:54:53 11 Here's what the -- here's what the specification  
11:55:01 12 says about what the probe transmitter does. In Block 202,  
11:55:05 13 the probe transmitter uses the specified probe parameters,  
11:55:09 14 those are the ones that it got, the form parameters from  
11:55:12 15 the probe request, to generate a probe having a form that  
11:55:15 16 complies with the specification.

11:55:18 17 So you get form parameters, and you generate a  
11:55:21 18 probe according to that. There is no concept in the patent  
11:55:25 19 of you generate, but it doesn't relate to form.

11:55:27 20 Now, in their brief, and counsel showed this, he  
11:55:33 21 says, ah, but there are other types of parameters. He says  
11:55:37 22 the payload content -- this is their argument from their  
11:55:40 23 brief -- in their reply brief at Page 7.

11:55:42 24 They say, the payload content, that's not form.  
11:55:46 25 Forms are things like number of symbols, cyclic prefix, and

11:55:52 1 transmit power of scaling factor. Those are form.

11:55:55 2 Now, again, nothing in the spec says that. No  
11:55:59 3 experts said that. That's just attorney argument that  
11:56:02 4 they've decided the ones in green are form, but the payload  
11:56:06 5 content is not. There's no support for this in the  
11:56:09 6 specification.

11:56:09 7 In fact, as we say, the only mandatory -- the only  
11:56:19 8 mandatory parameter is payload. So when the patent says,  
11:56:23 9 having a form specified by these parameters, accordingly,  
11:56:28 10 the probe request specifies a plurality of parameters  
11:56:31 11 associated with the generation and transmission of a  
11:56:34 12 probe --

11:56:35 13 THE COURT: Slow down, please.

11:56:35 14 MR. BENYACAR: I apologize, Your Honor.

11:56:37 15 -- including the content payload of a probe.

11:56:39 16 So it's a form, and then it goes on and puts  
11:56:44 17 "form" in quotes, and then it says: What does that mean?

11:56:46 18 Accordingly, a probe request specifies a plurality  
11:56:49 19 of parameters associated with the generation and  
11:56:51 20 transmission of a probe, including the content payload of a  
11:56:55 21 probe.

11:56:55 22 Their argument is the content payload is not form.  
11:57:00 23 It's the only one that's expressly called out as being a  
11:57:04 24 form in this key passage.

11:57:05 25 Now, the specification also says -- this is on

11:57:14 1 Slide 139 now -- the probe request specifies a plurality of  
11:57:20 2 parameters for the probe that will dictate the form of the  
11:57:22 3 probe. These parameters are discussed in more detail below  
11:57:25 4 with respect to Figure 5.

11:57:28 5 Figure 5 is a whole panoply of different  
11:57:31 6 parameters. They're all form.

11:57:33 7 And among those many parameters, which are all  
11:57:41 8 form, is the content payload. It says, Figure 5, the probe  
11:57:47 9 request specifies a raw data sequence for the probe, in  
11:57:50 10 other words, exactly what the data is going to be in it, or  
11:57:52 11 just for the probe's payload.

11:57:54 12 But, in fact, they're all form parameters.  
11:57:59 13 There's a whole grouping of a whole bunch of parameters.  
11:58:03 14 They're all form parameters.

11:58:04 15 Now, okay. Well, what's the plain meaning of  
11:58:10 16 form? Well, one plain meaning is a prescribed and set  
11:58:14 17 order of words. So exactly what would be in the content  
11:58:17 18 payload would be form, even according to the plain meaning.

11:58:21 19 Now, their argument is -- let's go back and look  
11:58:25 20 at their argument. They say the payload content is not  
11:58:29 21 form, but the transmit power, the power at which you  
11:58:34 22 transmit the payload, that is the form.

11:58:38 23 It's not in the patent. It's certainly -- right?  
11:58:41 24 The patent tells you what that is. The power scaling  
11:58:44 25 factor for the payload relative to the preamble, so it's

11:58:48 1 the power at which you're going to generate -- so the power  
11:58:51 2 at which you're going to transmit the payload.

11:58:55 3 Can it possibly be that the payload content  
11:58:58 4 itself, the data sequence, that what you're going to put in  
11:59:01 5 it when you generate it is not the form but the power at  
11:59:04 6 which you're going to transmit it is? I mean, that's  
11:59:08 7 counsel's argument, and it's completely unsupported.  
11:59:12 8 There's nothing in the patent that makes any of the  
11:59:14 9 distinctions that he made.

11:59:18 10 THE COURT: Well, you've got the burden since  
11:59:19 11 you're alleging that it's indefinite.

11:59:22 12 Let me see if I can ask this question coherently.

11:59:29 13 The generating limitation involves a first  
11:59:33 14 plurality of parameters that dictates the form of the  
11:59:35 15 probe. A second plurality of parameters is not recited as  
11:59:39 16 dictating the form of the probe. The manner in which the  
11:59:43 17 generating the probe is in accordance with the second  
11:59:47 18 plurality of parameters is simply not recited.

11:59:52 19 So where do you find an inconsistency that gives  
11:59:57 20 rise to indefiniteness by clear and convincing evidence?

12:00:00 21 MR. BENYACAR: Because if you -- if you make  
12:00:07 22 something, that relates to its form, right? So if you make  
12:00:10 23 a cup or you make the glasses, the parameters that you use  
12:00:15 24 to make the glasses, like should be -- this should be the  
12:00:20 25 rim, this should be this far, those relate to its form, and



12:00:24 1 the patent says that.

12:00:25 2           There's no -- there's no explanation of how you  
12:00:29 3 would generate something and have that -- the parameters  
12:00:32 4 you're using to make it not relate to the form of the  
12:00:35 5 thing.

12:00:35 6           Now, I don't -- what I'm saying is that "form" in  
12:00:41 7 this patent, because it had quotes around it, they're going  
12:00:44 8 to tell you what it means. So when the claim says "form,"  
12:00:47 9 I'm not arguing that makes it indefinite. All these things  
12:00:50 10 relate to form.

12:00:52 11           They are arguing, oh, well, some things are form,  
12:00:54 12 and some things aren't, and I'm Entropic, I'm going to  
12:00:58 13 decide what those things are.

12:01:00 14           Well, their form is indefinite if they're allowed  
12:01:02 15 to do that and say, well -- which is their argument. The  
12:01:06 16 content payload of the probe is not form, but the power at  
12:01:09 17 which you transmit it is, well, then form itself is  
12:01:13 18 indefinite. Wasn't my argument.

12:01:16 19           But if they're allowed to say, well, you can  
12:01:18 20 generate it in ways that are not form and I, Entropic, will  
12:01:22 21 pick what doesn't relate to form in ways that don't  
12:01:25 22 correspond to anything in the specification, then it's  
12:01:27 23 indefinite for that reason.

12:01:28 24           There's no way to generate something in a way  
12:01:32 25 that's unrelated to its form. And the patent doesn't give

12:01:37 1 any examples and, in fact, says form relates to generation  
12:01:40 2 and transmission.

12:01:41 3 The patent says the opposite, right? Again, we're  
12:01:50 4 back to the key language: The receiver determined probe to  
12:01:55 5 generate a probe having the form specified by these  
12:01:58 6 parameters.

12:01:59 7 "Form" is in quotes.

12:02:00 8 Accordingly -- meaning in other words or it  
12:02:04 9 follows that or however you want to say it --

12:02:07 10 THE COURT: I know what accordingly means.

12:02:09 11 MR. BENYACAR: Okay. Accordingly, the probe  
12:02:11 12 request specifies a plurality of parameters associated with  
12:02:14 13 the generation and transmission of a probe.

12:02:17 14 That form parameters in quotes are parameters  
12:02:20 15 associated with the generation and transmission of a probe.  
12:02:23 16 That's what it is. That's what it is in the patent. The  
12:02:26 17 patent is crystal clear about this in Column 2, Lines 3  
12:02:30 18 through 9, and it's also consistent with how we would all  
12:02:34 19 understand how you would generate something.

12:02:36 20 We couldn't figure out how you would generate  
12:02:38 21 these glasses in accordance with parameters that don't  
12:02:41 22 relate to the form of the glasses.

12:02:50 23 THE COURT: Isn't it fairly straightforward to  
12:02:52 24 imagine that the first plurality of parameters could  
12:02:55 25 specify certain types of data for the payload? And then

12:02:59 1 the second plurality of parameters sets forth the data  
12:03:03 2 values for the payload? Is that -- is that not fairly  
12:03:08 3 straightforward in your mind?

12:03:09 4 MR. BENYACAR: So let me just go to the claim  
12:03:11 5 language, Your Honor, and see if we can -- I want to make  
12:03:16 6 sure I understand.

12:03:16 7 So you're saying the first plurality of parameters  
12:03:22 8 would be -- would be the --

12:03:24 9 THE COURT: Would specify the types of data for  
12:03:28 10 the payload.

12:03:29 11 MR. BENYACAR: Okay.

12:03:29 12 THE COURT: And then the second plurality would  
12:03:31 13 set forth the data values for the payload.

12:03:34 14 MR. BENYACAR: The patent says the opposite. The  
12:03:36 15 patent says that the probe request specifies the content  
12:03:40 16 payload, not the form of the content payload, the content  
12:03:45 17 payload. In fact, including the content payload of the  
12:04:08 18 probe. I have this underlined in this section.

12:04:10 19 Not the form of what the -- how wide the content  
12:04:14 20 payload is going to be, but what it includes.

12:04:20 21 In addition, we looked at Figure 5, which are the  
12:04:22 22 parameters that the probe -- are in the probe request,  
12:04:25 23 right, and the specification says those are form  
12:04:29 24 parameters. And what it says is the probe receiver sends  
12:04:32 25 in the probe request the raw data sequence for the probe or

12:04:35 1 just for the probe's payload. The whole thing or just for  
12:04:38 2 the payload. That's what's actually in the probe. It's  
12:04:41 3 not just what the content -- what the form is that it's  
12:04:45 4 going to fit in. It's the raw data sequence. That's the  
12:04:49 5 actual bits.

12:04:54 6 THE COURT: All right.

12:04:58 7 MR. BENYACAR: Your Honor, if you don't have any  
12:05:01 8 more questions, I'll step down.

12:05:02 9 THE COURT: I don't.

12:05:03 10 Is there anything further from Plaintiff before we  
12:05:07 11 move on?

12:05:08 12 MR. SHIMOTA: I'd just like to clarify one thing  
12:05:10 13 for the record, Your Honor. I think you hit everything  
12:05:12 14 very well.

12:05:14 15 Mr. Benyacar has stated repeatedly on the record  
12:05:16 16 that in our briefing and in my presentation today that  
12:05:19 17 we're taking the position that the payload content is not a  
12:05:24 18 form parameter.

12:05:25 19 We've never said that. I agree, it's one of seven  
12:05:28 20 enumerated parameters. We've never taken that position, so  
12:05:30 21 I just want to clarify that for the record. But,  
12:05:34 22 otherwise, unless you have further questions, we'll move  
12:05:36 23 on.

12:05:37 24 THE COURT: No.

12:05:39 25 MR. SHIMOTA: Thank you, Your Honor.

12:05:40 1 THE COURT: And we're rapidly running out of time,  
12:05:44 2 Counsel.

12:05:44 3 MR. SHIMOTA: Okay. For our -- may I ask a  
12:05:46 4 question, Your Honor?

12:05:47 5 THE COURT: Go ahead.

12:05:48 6 MR. SHIMOTA: For our -- for our planning  
12:05:49 7 purposes, do you have an idea of approximately how much  
12:05:52 8 time we do have?

12:05:55 9 THE COURT: To be honest with you, no.

12:05:59 10 MR. SHIMOTA: Okay. Then we will --

12:06:01 11 THE COURT: I don't mind going over the specified  
12:06:03 12 time limit if we can get finished. Although, I have a  
12:06:07 13 matter at 1:00 o'clock I must be at.

12:06:07 14 MR. SHIMOTA: Okay.

12:06:12 15 THE COURT: It's going to take me about 10 minutes  
12:06:13 16 to get there. And we're at about six or seven minutes  
12:06:15 17 after 12:00 now, and you've still got a handful of terms  
12:06:21 18 remaining.

12:06:22 19 I guess my question to counsel is, is there  
12:06:26 20 anything within which we have not covered that you feel  
12:06:30 21 especially strongly about presenting oral argument on,  
12:06:35 22 because if we do fail to cover orally everything that's  
12:06:39 23 left, what's not been covered by way of oral argument I'll  
12:06:43 24 decide on the papers.

12:06:44 25 Is there anything within what's left that you

12:06:47 1 think is a top priority to cover orally?

12:06:51 2 MR. SHIMOTA: So I would suggest, Your Honor, that  
12:06:52 3 you turn to the '682 patent, I think there's -- I think the  
12:06:57 4 '362 is from our perspective fully briefed if that would  
12:07:00 5 please you.

12:07:02 6 MR. BENYACAR: Your Honor, we would take the  
12:07:03 7 opposite view.

12:07:10 8 THE COURT: All right. Well, the next couple of  
12:07:19 9 terms are from the '362. And then we get on to the '682.

12:07:37 10 All right. Let's see if we can't get through  
12:07:40 11 the -- let's see if we can't get through the remaining  
12:07:43 12 terms, but let's move forward with the '362 patent.

12:07:45 13 MR. SHIMOTA: Thank you, Your Honor. My colleague  
12:07:47 14 or --

12:07:48 15 THE COURT: Yeah, I want to hear about  
12:07:50 16 "downconverting...a plurality of frequencies" and the  
12:07:53 17 "order of steps" in Claim 11 of the '362 together.

12:07:57 18 And let's start with the Plaintiff.

12:08:03 19 MR. SHIMOTA: Okay. Thank you. My colleague,  
12:08:05 20 Mr. Engel, will handle it.

12:08:07 21 Thank you for your time, Your Honor.

12:08:08 22 THE COURT: All right.

12:08:09 23 MR. ENGEL: Thank you, Your Honor. Mr. Engel, for  
12:08:13 24 the record, again.

12:08:15 25 THE COURT: Go ahead, Mr. Engel.

12:08:16 1 MR. ENGEL: Thank you.

12:08:16 2 So we're going to take both terms together as you  
12:08:21 3 have suggested. It really boils down to the same thing and  
12:08:26 4 whether downconverting can be downconverting a digital  
12:08:28 5 signal or does it have to be downconversion of an analog  
12:08:33 6 signal. Both go to the order of the steps.

12:08:35 7 If you require downconverting to be analog only,  
12:08:39 8 then you have decided the order of the steps, that way we  
12:08:43 9 think that it can be done, downconverting of the analog or  
12:08:46 10 digital, and we'll explain why.

12:08:47 11 We've cited a couple of cases. Interactive Gift  
12:08:52 12 Express from 2001. The Federal Circuit case that's clearly  
12:08:55 13 on point. You know, if the claims do not require a  
12:08:58 14 specific order and the specification does not mandate a  
12:09:01 15 specific order, you cannot and should not require a  
12:09:05 16 specific order.

12:09:06 17 There's a more recent case, the Baldwin Graphics  
12:09:11 18 case, that's actually pretty on point. I do have an extra  
12:09:15 19 copy of that opinion if you'd like it, Your Honor.

12:09:17 20 But I think in there they found that there was a  
12:09:21 21 requirement for a third step, which is the case here to be  
12:09:24 22 in order, but that the two intervening steps were capable  
12:09:27 23 of being performed in either order, which is the case for  
12:09:33 24 the specific claims here.

12:09:33 25 Moving on to the actual claim language, the

12:09:37 1 Defendant's going to take a different view on antecedent  
12:09:40 2 basis and usage of terms. But we've highlighted the  
12:09:44 3 introduction of the language and how it's used in the  
12:09:47 4 claim.

12:09:47 5 And so in Claim 11, there's downconverting of a  
12:09:52 6 plurality of frequencies. They include desired signals and  
12:09:56 7 undesired -- or desired television channels and undesired  
12:09:59 8 television channels.

12:10:00 9 The digitizing step includes the same limitation.  
12:10:05 10 It uses "said" obviously because it's been introduced  
12:10:08 11 previously. But it's the same plurality of frequencies,  
12:10:11 12 you know, comprising the desired and undesired television  
12:10:14 13 channels.

12:10:15 14 But notably, when you get down to the selecting  
12:10:17 15 step, it's selecting by digital circuitry said plurality of  
12:10:24 16 desired television channels from said digitized plurality  
12:10:26 17 of frequencies.

12:10:27 18 So our position is if the -- that the -- by not  
12:10:35 19 referring to downconverted -- so, for example, in the  
12:10:39 20 digitizing step, if it had said, digitizing, you know, a  
12:10:45 21 downconverted plurality of frequencies, then there would  
12:10:50 22 have been a requirement that downconversion come first. It  
12:10:52 23 doesn't say that. It doesn't say digitizing the  
12:10:52 24 downconverted plurality of frequencies.

12:10:55 25 Now, it does say that in the selecting steps. We



12:10:59 1 know that digitization has to happen before the selecting  
12:11:02 2 step. So we've created a graphic on the right of Slide 54  
12:11:05 3 where we think that downconverting and/or digitizing could  
12:11:08 4 happen in either order. Clearly, by the time you get to  
12:11:11 5 the selecting step, they have to be digitized. That's our  
12:11:15 6 plain reading of the claim language, and we think that the  
12:11:18 7 specification supports that.

12:11:19 8 So --

12:11:21 9 THE COURT: And the selecting has got to happen  
12:11:23 10 before the output?

12:11:25 11 MR. ENGEL: That's correct, Your Honor, yeah.

12:11:26 12 Figure 4 is one example. I think Figure 2 in the  
12:11:32 13 patent is another example where you see there's an analog  
12:11:35 14 portion on the left-hand side, there's the  
12:11:38 15 analog-to-digital converters in the middle, and then  
12:11:41 16 there's a digital front end which includes mixers  
12:11:41 17 identified as 432.

12:11:44 18 The description of both of those for Figure 4, as  
12:11:48 19 well as for Figure 2, I think the mixer is 250, it talks  
12:11:51 20 about downconverting those signals to a baseband frequency.  
12:11:55 21 That's a downconversion that takes place in the digital  
12:11:58 22 domain versus the analog domain.

12:12:00 23 Now, the patent required -- the patent says it can  
12:12:03 24 happen either in the analog or the digital. So our  
12:12:06 25 position is the claim claims both, the steps can happen in

12:12:09 1 either order.

12:12:11 2 Now, there's an argument by Defendants that our --  
12:12:15 3 our argument doesn't matter because it's only talking about  
12:12:18 4 desired signals and not the whole desired and undesired.  
12:12:23 5 So it's not talking about downconverting everything.

12:12:25 6 But I think if you read the specification all the  
12:12:28 7 way through, you'll see that it does envision a situation  
12:12:32 8 in which it could be desired channels, or it could be a mix  
12:12:36 9 of the channels, or it could be all the channels available,  
12:12:38 10 which would include the undesired channels.

12:12:40 11 And this kind of gets back to the issue we talked  
12:12:44 12 about with the '008 patent earlier today.

12:12:47 13 And so up on Slide 56, we have a passage from the  
12:12:51 14 patent -- and I'm not sure -- I'll try to get the cite for  
12:12:55 15 you here, Your Honor.

12:12:55 16 But the idea is that there's an N number of these  
12:13:02 17 mixers. This is 250 in Figure 1. So you can have it  
12:13:06 18 corresponding to the desired RF channels, you can have it  
12:13:10 19 be any integer value. And in one embodiment, N can be  
12:13:13 20 equal to the number of all available channels that exist in  
12:13:15 21 the licensed frequency spectrum to provide system  
12:13:18 22 flexibility.

12:13:18 23 And this is what we talked about earlier. The  
12:13:21 24 licensed frequency spectrum is a very wide, you know,  
12:13:23 25 spectrum. It has to include the undesired channels because

12:13:26 1 I can't envision any situation in which you would be able  
12:13:29 2 to provide all of the television channels to end users. I  
12:13:33 3 can't envision a situation in which all the television  
12:13:35 4 channels in the spectrum would be desired.

12:13:37 5 So our read is that this is clearly providing to  
12:13:43 6 downconversion of desired and undesired channels. And,  
12:13:47 7 again, these N complex mixers are in the digital domain.  
12:13:51 8 So we believe this is an example of where the order of the  
12:13:53 9 steps doesn't matter for the first two steps because there  
12:13:55 10 is support in the specification that it can be done in  
12:13:59 11 either order.

12:14:03 12 THE COURT: All right. Thank you. Let me hear  
12:14:05 13 from the Defendant, please.

12:14:06 14 MR. ENGEL: And for the record, the cite from the  
12:14:09 15 '362 patent was Column 5, Lines 31 to 38.

12:14:12 16 THE COURT: All right. Mr. Benyacar, what's your  
12:14:17 17 client's position?

12:14:18 18 MR. BENYACAR: Our client's position is that the  
12:14:21 19 steps have to be performed in the order recited.

12:14:25 20 THE COURT: Tell me why.

12:14:26 21 MR. BENYACAR: So as this Court knows, Courts  
12:14:36 22 apply two-part tests to determine whether a particular  
12:14:38 23 order is required.

12:14:40 24 First, you look at the claim language to determine  
12:14:42 25 as a matter of logic or grammar whether the order is

12:14:47 1 required. If not, you look to the specification to see  
12:14:49 2 whether it directly or implicitly requires the order  
12:14:52 3 recited. So on Slide 147, in this case, both of those  
12:14:58 4 steps apply.

12:14:58 5 This is Claim 11 I have on Slide 148. And it's  
12:15:05 6 broken up -- I have a line in the middle of the claim steps  
12:15:08 7 before and after digitization.

12:15:13 8 So before digitization, you see the claim calls  
12:15:16 9 for downconverting a plurality of frequencies. Then you  
12:15:20 10 have the digitizing step. What you digitize is the  
12:15:24 11 plurality of frequencies because obviously it's not digital  
12:15:28 12 yet. That's what you're digitizing.

12:15:29 13 So before digitization, the claim refers to them  
12:15:32 14 as a plurality of frequencies. After digitization, you  
12:15:35 15 notice it's now referred to as a digitized plurality of  
12:15:43 16 frequencies. The claim is tracking the order. After it  
12:15:46 17 becomes digital, now they're the digitized plurality of  
12:15:50 18 frequencies.

12:15:50 19 Now, in his presentation, counsel took great  
12:15:52 20 comfort in the fact that, well, those first two steps, it  
12:15:56 21 just says a plurality of frequencies, so sure, the third  
12:15:59 22 step has to be performed after.

12:16:00 23 But the first two he says are just a plurality of  
12:16:03 24 frequencies. Well, the only reason that is, is because the  
12:16:06 25 downconverting occurs before the digitization. That's why

12:16:11 1 they're a plurality of frequencies and not a digitized  
12:16:14 2 plurality.

12:16:16 3 Let's look at how the claim would have to be  
12:16:18 4 rewritten if you did it counsel's way. This is on Slide  
12:16:21 5 149. Let's say, as counsel suggests, you can do the  
12:16:22 6 digitizing step first. Well, now I move the line up to  
12:16:26 7 where you -- now you have a digital signal, right?

12:16:29 8 Well, if you digitize first, then you would  
12:16:31 9 digitize a plurality of frequencies, but then the  
12:16:34 10 downconverting, you'd have to rewrite that step to be on a  
12:16:38 11 digitized plurality of frequencies because now it's  
12:16:40 12 digital. You'd actually have to rewrite the claim to  
12:16:42 13 insert "digital."

12:16:43 14 The claim very clearly distinguishes the digitized  
12:16:47 15 versus non-digitized. And if you did the digitizing first,  
12:16:47 16 then the downconverting would have to be on a digitized  
12:16:51 17 plurality of frequencies.

12:16:51 18 The claims itself as a matter of logic and as a  
12:16:57 19 matter of grammar require the claimed order, and the only  
12:17:02 20 reason that what counsel relies on, which is that the first  
12:17:06 21 two steps are a plurality, that only works because the  
12:17:08 22 downconverting is occurring before the digitization. If it  
12:17:13 23 happened after the digitization, they wouldn't be the same.

12:17:16 24 And so the claims on their face require that the  
12:17:19 25 downconverting occur before the digitization, or you'd have

12:17:23 1 to rewrite the claim to say a digitized plurality of  
12:17:26 2 frequencies, just like the sorting step says.

12:17:30 3 THE COURT: All right.

12:17:31 4 MR. BENYACAR: So that's the end of the analysis  
12:17:33 5 on the claim language.

12:17:36 6 And I think Function Media is a good example. The  
12:17:39 7 Court said that there was a limitation processing and  
12:17:42 8 published the electronic advertisement, which the Plaintiff  
12:17:46 9 said could include actually making the advertisement.

12:17:50 10 And the Federal Circuit said, no, because  
12:17:51 11 otherwise the claim processing would have been written to  
12:17:54 12 be performed on the inputted information.

12:17:57 13 That's the same here. If you rewrote the claims  
12:18:01 14 so that the downconverting occurred after digitization, you  
12:18:07 15 would have to rewrite the claim to be on a digitized  
12:18:10 16 plurality of frequencies.

12:18:11 17 So the claim itself requires that now we want to  
12:18:12 18 talk about how even the second step is satisfied. The  
12:18:15 19 specification implicitly or directly requires that you use  
12:18:20 20 the analog mixer.

12:18:23 21 So the point of the invention or one of the main  
12:18:28 22 points is you have a very wide signal coming into the  
12:18:31 23 system, and you want to reduce the bandwidth because  
12:18:34 24 otherwise expensive analog-to-digital converters would be  
12:18:38 25 required. That's what the specification says, and I have

12:18:40 1 excerpted that on Slide 151.

12:18:44 2 So you see, on -- in the figure, the incoming

12:18:50 3 signal has a bandwidth BW1, which is at the bottom,

12:18:55 4 bandwidth No. 1, right? That's the incoming bandwidth.

12:18:58 5 That bandwidth has desired and undesired channels.

12:19:03 6 It's shown on 153.

12:19:05 7 I've highlighted the desired ones. The desired

12:19:08 8 ones are the ones that are shaded. The undesired ones are

12:19:11 9 the ones that are not shaded.

12:19:13 10 And the specification says, you notice, the

12:19:15 11 desired ones are not contiguous because they're undesired

12:19:19 12 ones in between. So that bandwidth 1 has both desired and

12:19:24 13 undesired channels in it.

12:19:25 14 So what happens next? There's an analog

12:19:28 15 downconversion. So counsel didn't show or didn't highlight

12:19:31 16 this part. There's an analog downconverter, and that

12:19:38 17 analog downconverter downconverts the received signal 102,

12:19:43 18 which is bandwidth BW1, which has the desired and undesired

12:19:48 19 channels, to a zero RF intermediate frequency or low

12:19:51 20 intermediate frequency band.

12:19:51 21 So it's doing downconverting, and it's

12:19:54 22 downconverting both the desired and the undesired channels

12:19:57 23 in the analog domain. The parties agree that RF signal is

12:20:02 24 an analog signal.

12:20:03 25 So what happens after that -- those analog mixers

12:20:07 1 operate? Well, on Slide 155, we have the analog-to-digital  
12:20:13 2 converters, and you'll notice on Slide 156 that now the  
12:20:18 3 input to the analog-to-digital converters are one-half of  
12:20:23 4 bandwidth BW1, right? That was the objective that we  
12:20:25 5 looked at before, reduce that signal bandwidth.

12:20:28 6 Well, it started at BW1, and it got reduced to  
12:20:31 7 one-half of BW1. And you know what did that? Those analog  
12:20:36 8 mixers. The patent says it's one-half of the incoming RF  
12:20:41 9 signal thanks to the complex down-mixer architecture. That  
12:20:45 10 component that they want to read out of this claim, that's  
12:20:47 11 the invention, but that's not all.

12:20:49 12 So, now, let's look at the digital mixers that  
12:20:55 13 Entropic relies on. What does the patent say about those?  
12:20:59 14 It says, it extracts a different one of the desired  
12:21:04 15 channels and frequency-shifts the extracted signals. It's  
12:21:09 16 only the desired channels that are downconverted.

12:21:14 17 And if that wasn't clear enough, Your Honor, as if  
12:21:19 18 the inventors knew we were going to be having this debate  
12:21:24 19 today, they helpfully in one concise passage described the  
12:21:28 20 functions of each of these three components we talked  
12:21:31 21 about, and they map exactly to the claim language.

12:21:32 22 So let's look at the green, the red, and the blue  
12:21:35 23 all in one, you know, one at a time, and see how that maps  
12:21:37 24 to the claim.

12:21:39 25 So what does the green analog mixer do? It has --



12:21:47 1 THE COURT: What would you do if I told you I was  
12:21:50 2 color blind?

12:21:51 3 MR. BENYACAR: I'd do that.

12:21:53 4 THE COURT: I'm not --

12:21:54 5 MR. BENYACAR: Oh.

12:21:55 6 THE COURT: -- but I see lawyers every day tell me  
12:21:57 7 look at the blue and the green and the pink and the purple,  
12:22:01 8 and I don't think anybody ever thinks about was the judge  
12:22:04 9 or the jury able to tell the color differences. But  
12:22:07 10 anyway, I can.

12:22:07 11 MR. BENYACAR: I'm relieved that that's not  
12:22:10 12 actually that situation.

12:22:10 13 MR. DACUS: You would have a very poor local  
12:22:14 14 counsel if counsel didn't inform him of that, Judge.

12:22:21 15 MR. BENYACAR: So let's look at this -- the very  
12:22:22 16 helpful and concise definition of those three components  
12:22:25 17 that the patentee provided and how they correspond to the  
12:22:27 18 Claim 11 of the '362 patent.

12:22:29 19 So this has a complex mixer module for  
12:22:38 20 downshifting the multiple RF channels, okay. That is the  
12:22:41 21 red, right? That's what the green analog does. And that  
12:22:45 22 corresponds to the claim downconverting, which is  
12:22:50 23 downconverting by a mixer module a plurality of frequencies  
12:22:54 24 that comprises a plurality of desired television channels  
12:22:55 25 and a plurality of undesired television channels.

12:22:58 1 Now, the only thing that does that is that green  
12:23:01 2 analog mixer, and it comes first before the  
12:23:04 3 analog-to-digital conversion just as the claims say.

12:23:08 4 And by the way, that's also the component that  
12:23:11 5 implements the allegedly novel feature of reducing the  
12:23:15 6 bandwidth.

12:23:15 7 Then next you have the analog-to-digital  
12:23:21 8 converters, which maps to the red claim language, one in  
12:23:25 9 sequence, digitized by a wideband analog-to-digital  
12:23:30 10 converter the plurality of desired television channels and  
12:23:33 11 the plurality of undesired television channels. So the  
12:23:37 12 analog mixer downconverted both, the analog-to-digital  
12:23:41 13 converter digitizes both.

12:23:44 14 Now, what does the patent say about the digital  
12:23:49 15 converters that Entropic relies on? It says that it  
12:23:53 16 contains complex mixers that frequency shift the number of  
12:23:56 17 desired channels, not the undesired channels.

12:24:02 18 And there is a claim element in Claim 11 which  
12:24:04 19 corresponds to that blue element, to the digital mixers,  
12:24:08 20 and it's referred to as digital circuitry. And what does  
12:24:11 21 it do? It selects said plurality of desired television  
12:24:18 22 channels. That's the component that -- that's the step  
12:24:21 23 that corresponds to the digital mixers that Entropic is  
12:24:25 24 relying on.

12:24:26 25 And this is Entropic's read. They're saying that

12:24:28 1 that analog downconverting really corresponds to the  
12:24:34 2 digital mixers which downconvert only desired, and the  
12:24:39 3 claim requires that the downconverting of desired and  
12:24:42 4 undesired, and even though that element is separately  
12:24:45 5 called for later in the claim and referred to as digital  
12:24:48 6 circuitry.

12:24:49 7           So what does Entropic have to say about that last  
12:24:56 8 point? They say, oh, you're ignoring the fact that -- that  
12:25:00 9 even though the specification says those things about the  
12:25:03 10 digital mixer, it can actually downconvert the undesired  
12:25:06 11 channels, too, because counsel says he can't envision a  
12:25:11 12 world where you would have, like, all of the frequencies be  
12:25:15 13 desired.

12:25:17 14           Well, that is exactly the opposite of what the  
12:25:19 15 specification expressly says. Here's the passage from the  
12:25:22 16 specification that counsel relied on in his presentation to  
12:25:25 17 you. It starts by saying: N is an integer value  
12:25:29 18 corresponding to the number of desired RF channels,  
12:25:34 19 desired.

12:25:38 20           N can be any integer value. It's not changing the  
12:25:42 21 definition of what N is. It's still the number of desired  
12:25:45 22 channels. Now, we're saying it can be any integer value.  
12:25:49 23 It can be equal to the number of all available channels  
12:25:52 24 that exist. Okay. That means all of them can be desired.  
12:25:54 25 It can change the definition of the variable N, that's

12:25:58 1 still desired channels.

12:26:00 2 N can be equal to the number of all receivable  
12:26:04 3 channels. That's what's desired in this example.

12:26:08 4 N can be equal to an integer value less than the  
12:26:11 5 number of receivable channels. Again, N is still the  
12:26:15 6 number of desired channels.

12:26:16 7 And how does it end? But in the preferred  
12:26:19 8 embodiment shown in Figure 2, the number of desired  
12:26:21 9 channels is 4. All of those examples refer to the number  
12:26:25 10 of desired channels. That is what the digital mixers  
12:26:34 11 downconvert. The number of desired channels, they can be  
12:26:37 12 any number, but they're desired, and they're desired only.

12:26:39 13 And the claim requires that the downconverting be  
12:26:42 14 performed on desired and undesired. And the only disclosed  
12:26:46 15 component that does that is the analog mixers, which not  
12:26:50 16 coincidentally is the exact order the claim is written in.

12:26:55 17 THE COURT: All right.

12:26:55 18 MR. BENYACAR: Thank you, Your Honor.

12:26:56 19 THE COURT: Thank you.

12:26:57 20 Okay. Let's move on to the '682 patent for the  
12:27:02 21 last series of disputed terms.

12:27:04 22 Let's start with "a composite SNR-related metric"  
12:27:16 23 from Claim 1.

12:27:17 24 Again, the Plaintiff tells me it's plain and  
12:27:19 25 ordinary meaning, and the Defendant tells me it's

12:27:21 1 indefinite.

12:27:21 2 Let me hear from the Defendant. Give me the basis  
12:27:28 3 for your indefiniteness argument first, and then I'll hear  
12:27:31 4 from the Plaintiff in response.

12:27:32 5 MR. BENYACAR: So this term calls for a composite  
12:27:52 6 SNR-related metric that's based at least in part on a  
12:27:55 7 worst-case SNR profile. Those are two distinct things.  
12:28:00 8 One is based at least in part on the other.

12:28:03 9 And every time I say this, counsel jumps and says,  
12:28:07 10 ah, that's just a written description argument. It's  
12:28:09 11 not because when -- again, many times when I say that, it's  
12:28:12 12 because we can't look to the specification for guidance on  
12:28:15 13 what these mean.

12:28:17 14 And that's the case here. These two different  
12:28:19 15 concepts do not appear in the specification.

12:28:21 16 THE COURT: The fact that they don't appear in the  
12:28:22 17 specification doesn't necessarily mean, though, that a  
12:28:25 18 person of ordinary skill wouldn't understand them, does it?

12:28:28 19 MR. BENYACAR: It doesn't. But let's -- but they  
12:28:31 20 do not have plain and ordinary meanings. And no one has  
12:28:34 21 argued otherwise.

12:28:34 22 So to be clear, these are terms that do not have  
12:28:37 23 plain and ordinary meanings and --

12:28:40 24 THE COURT: Isn't that what the Plaintiff is  
12:28:42 25 asking me to construe them as?

12:28:44 1 MR. BENYACAR: Yeah, but there are none. So once  
12:28:46 2 again, they say plain and ordinary meaning, but they cite  
12:28:48 3 to none.

12:28:49 4 THE COURT: All right.

12:28:49 5 MR. BENYACAR: And by the way, Your Honor, not  
12:28:55 6 only do they cite to none, in this case, as in many cases,  
12:28:59 7 they don't actually even tell you what the plain and  
12:29:01 8 ordinary meaning is. So they don't say, oh, here's a  
12:29:04 9 dictionary or -- right? And this is another case where  
12:29:06 10 they say, oh, you're wrong, but we don't actually have an  
12:29:10 11 alternative. Just don't construe it.

12:29:12 12 So the specification of this patent discloses one  
12:29:18 13 concept, you assign cable modems to service groups, and  
12:29:24 14 after that, you communicate with all of the cable modems  
12:29:27 15 for the service groups in the same way. There's no dispute  
12:29:30 16 about that.

12:29:31 17 So once cable modems are in the service group, the  
12:29:34 18 parameters that you use to communicate with all of them are  
12:29:36 19 the same. That's why they're in the group.

12:29:38 20 And composite worst-case SNR profile relates to  
12:29:47 21 what you do after you've assigned the cable modems to  
12:29:47 22 service groups and how you decide how you're going to  
12:29:49 23 communicate with the cable modems in that service group.

12:29:55 24 Now, what the specification says is you notice in  
12:29:59 25 Figure 3A, it refers to composite SNR profiles, which I've

12:30:06 1 highlighted in green or underlined in green, and that's  
12:30:09 2 Block 308.

12:30:10 3 And the specification explains what block 308 is.  
12:30:15 4 It's for any particular service group, you communicate with  
12:30:17 5 the cable modems on a particular subcarrier based on the  
12:30:21 6 worst-case SNR for that subcarrier among the cable modems  
12:30:24 7 in that particular service group. And the specification  
12:30:26 8 repeatedly refers to that as the composite worst-case SNR  
12:30:31 9 profile.

12:30:32 10 And you notice that even though 308 uses the term  
12:30:37 11 "composite SNR profile," because they don't have to spell  
12:30:41 12 out the whole thing because there is only one concept in  
12:30:45 13 the patent, a composite worst-case SNR profile.

12:30:49 14 And this is what that is, and this is why it works  
12:30:51 15 allegedly to communicate with all of the cable modems in a  
12:30:54 16 service group in the same way.

12:30:55 17 What you do is at the bottom of Figure 2B, you see  
12:30:58 18 there's sub1, sub2. Those are the different subchannels  
12:31:04 19 that the specification is referring to.

12:31:05 20 Let's say it's subchannels 2, 5, and 7, cable  
12:31:10 21 modem A in the service group has the worst SNR of the whole  
12:31:14 22 group. So what you do is you use this composite worst-case  
12:31:18 23 SNR profile, and you say you know what, if I want to  
12:31:21 24 communicate with the cable modems on subchannel 2, I'm  
12:31:23 25 going to pick parameters that suit cable modem A, because

12:31:28 1 if I can communicate with A, I can communicate with any of  
12:31:32 2 them because it's the worst case, right?

12:31:34 3 And so it has this composite, and for every  
12:31:38 4 subcarrier it has what the worst case is in the service  
12:31:42 5 group, and it uses the worst case to communicate, because  
12:31:42 6 you know if you can communicate with the worst case, you  
12:31:45 7 can communicate with all of them.

12:31:46 8 And so in this example, at each different  
12:31:49 9 subcarrier, in this example, I say a different cable modem  
12:31:52 10 is the worst case. And the population of these different  
12:31:57 11 worst cases is the composite worst-case SNR profile. That  
12:32:02 12 is what the specification says at Column 5, Lines 40  
12:32:05 13 through 46. That language that we just discussed is  
12:32:09 14 explaining exactly what I -- what I show here. That's the  
12:32:11 15 composite worst-case SNR profile. It's one concept in the  
12:32:17 16 patent.

12:32:17 17 Now, what does the claims say? The claim says you  
12:32:21 18 have two things. You have a composite SNR-related metric  
12:32:25 19 based at least in part on a worst-case SNR profile.

12:32:30 20 Well, what's the difference between those? We're  
12:32:33 21 honestly, like, trying to figure out what Entropic's  
12:32:35 22 position is, because through even their reply briefing,  
12:32:37 23 they have never said that's what this is and that's what  
12:32:40 24 this is. They say they're different. But they don't  
12:32:42 25 explain how it's different from what the specification



12:32:44 1 discloses, which is a composite worst case.

12:32:47 2 So here's -- so I've tried to figure this out.

12:32:52 3 They say, so let's start with the second one, worst-case  
12:32:56 4 SNR profile. What does that mean? They say -- and this is  
12:33:01 5 on Page 27 of their opening brief. They say, the  
12:33:04 6 specification describes examples of a worst-case SNR  
12:33:08 7 profile. And then they provide a block quote in which  
12:33:11 8 every example is a composite worst-case SNR profile.

12:33:17 9 So we deduced they must agree that worst-case SNR  
12:33:22 10 profile is the same as composite worst-case SNR profile.  
12:33:25 11 They didn't say, no, in their reply brief. They didn't  
12:33:27 12 say, yes. They didn't -- but we said, we're assuming  
12:33:30 13 that's what you mean.

12:33:30 14 So let's say that that's what it is. Okay. Well,  
12:33:35 15 what is a composite SNR-related metric, then, if it's not a  
12:33:41 16 composite worst-case SNR profile?

12:33:44 17 And this is what Entropic's expert said in his  
12:33:47 18 expert report on this issue. He said, the '682 patent  
12:33:52 19 discusses composite SNR-related metric as being a composite  
12:33:57 20 of metrics in the context of worst-case SNR because that is  
12:34:01 21 part of the disclosed invention.

12:34:03 22 In other words, yeah, you're right, that in the  
12:34:07 23 patent, it's a composite worst-case SNR profile, but the  
12:34:12 24 patent is only discussing worst case because that's what  
12:34:15 25 the invention is.

12:34:16 1 Then he goes on to say, like, in effect, outside  
12:34:19 2 the context of the invention -- and this is in the purple  
12:34:20 3 language -- the composite SNR-related metric could also  
12:34:24 4 include the best-case SNR, which has absolutely nothing to  
12:34:27 5 do with the invention nor does he allege it does.

12:34:31 6 But he's saying when you read composite  
12:34:35 7 SNR-related metric, the reason why that's not also  
12:34:38 8 composite worst-case SNR profile is because in isolation,  
12:34:41 9 in a vacuum, it could include the best case.

12:34:43 10 He doesn't say the specification discloses use of  
12:34:46 11 a best case, nor does he explain how the specification  
12:34:49 12 would disclose using a worst-case SNR profile in part to  
12:34:55 13 generate a composite best case.

12:34:58 14 But, Your Honor, we know that you can't construe a  
12:35:02 15 claim term in isolation and say, well, in isolation, it  
12:35:05 16 could be the best case.

12:35:08 17 So because there's only one concept disclosed and  
12:35:14 18 because both the composite worst SNR-related metric and the  
12:35:19 19 worst-case SNR profile can only refer to the only concept  
12:35:23 20 disclosed, which is the composite worst-case SNR profile,  
12:35:25 21 the claim has to be indefinite because you can't base one  
12:35:29 22 at least in part on the other. They're the same thing.

12:35:33 23 THE COURT: All right. Let me hear from the  
12:35:40 24 Defendant -- excuse me, the Plaintiff, I'm sorry.

12:35:44 25 MR. BRIDGES: Thank you, Your Honor. And Kenneth

12:35:48 1 Bridges for the Plaintiff, Entropic, for the record.

12:35:51 2 And I know time is short -- yeah, thank you,  
12:35:52 3 Ms. Allor. I appreciate that.

12:35:52 4 I know time is short, so I will try to make this  
12:36:01 5 presentation --

12:36:04 6 THE COURT: Just tell -- just tell me why opposing  
12:36:06 7 counsel is wrong.

12:36:07 8 MR. BRIDGES: Well, two reasons, Your Honor.

12:36:09 9 Legally, there's no pathway to indefiniteness, and  
12:36:11 10 this is a déjà vu. Your Honor has heard it several times  
12:36:16 11 today. Opposing counsel takes rather strident objection to  
12:36:20 12 us pointing out that this is really some kind of written  
12:36:20 13 description argument masquerading as an indefiniteness  
12:36:24 14 argument, but, I mean, it is.

12:36:25 15 It's not necessarily a mark against them. I might  
12:36:28 16 have tried the same thing myself if I were in their shoes.

12:36:32 17 But Your Honor knows the law very, very well in  
12:36:34 18 this area, and I dare say better than I do. And I would  
12:36:36 19 just like to alert the Court to that issue.

12:36:38 20 What this boils down to is an argument by the  
12:36:44 21 Defendant that there is no disclosure of anything else  
12:36:48 22 other than the particular example that he walked you  
12:36:53 23 through. That is the argument. And because there is  
12:36:56 24 nothing else disclosed other than the particular example he  
12:37:01 25 walked you through, that means there is only one thing

12:37:06 1 disclosed in the patent, and as he just said, if there's  
12:37:09 2 only one thing and the claim requires two things, then we  
12:37:13 3 have a problem.

12:37:14 4           So if we look at the claim, Mr. Benyacar is  
12:37:17 5 actually right. There are two different things that are  
12:37:19 6 required by the claim.

12:37:22 7           The first thing -- and I'm, for time purposes,  
12:37:26 8 Your Honor, skipping down to the third element, right, to  
12:37:29 9 what I think both sides are really arguing about here. And  
12:37:32 10 this is the question of how are we going to decide what  
12:37:34 11 communication parameters to use.

12:37:36 12           So we've already sorted our modems out into  
12:37:39 13 groups, and we want to decide what parameters to use.

12:37:42 14           Now, the claim could just say decide communication  
12:37:47 15 parameters. But the claim is actually a little bit more  
12:37:50 16 specific than that. The claim says that we have to use a  
12:37:52 17 composite SNR metric based at least in part on a profile.

12:37:59 18           The crucial words here are "composite" and  
12:38:02 19 "profile."

12:38:03 20           What's composite? Composite is relating to cable  
12:38:09 21 modems. It is across the service group.

12:38:13 22           Profile, on the other hand, relates to  
12:38:17 23 frequencies. How do we know that? Well, let's take a look  
12:38:20 24 at, for example, dependent claims. Those are always a  
12:38:25 25 great place to go and get more clarity.

12:38:27 1 Here we see in Dependent Claim 6, when we have a  
12:38:32 2 service group that has a composite SNR versus frequency  
12:38:37 3 profile in this dependent claim -- the key word is  
12:38:40 4 "composite." The dependent claim, however, also is calling  
12:38:43 5 out a particular cable modem. And when it's a particular  
12:38:47 6 cable modem, the dependent claim is not using the term  
12:38:52 7 "composite." Composite means for the group.

12:38:55 8 It's the same thing in the specification.  
12:38:57 9 Composite means for the group, and you can see in  
12:39:00 10 highlighting, Your Honor -- and I'm very glad to hear that  
12:39:03 11 you're not color blind because I was staring daggers at  
12:39:06 12 Mr. Hill for not knowing that since I like blue in my  
12:39:10 13 slides -- a "composite SNR profile" is the term that is  
12:39:15 14 used whenever this example, at 5:7-12, is being discussed  
12:39:20 15 for a service group. Whereas, if we're discussing an  
12:39:24 16 individual cable modem, you can see in gray, we're  
12:39:27 17 discussing just a profile, right?

12:39:31 18 So we have the two different terms, "profile" on  
12:39:34 19 its own when we're discussing one cable modem, "composite  
12:39:40 20 profile" when we're discussing multiple cable modems.

12:39:44 21 And now, these are -- and there's more examples on  
12:39:49 22 the right. Again, in view of time, we're not going to go  
12:39:53 23 through those in detail.

12:39:54 24 What about profile? The story with profile in the  
12:39:57 25 specification is perfectly straightforward. As Your Honor

12:40:00 1 undoubtedly knows from prior cases and OFDM, you're using  
12:40:04 2 multiple different frequencies. We call those often  
12:40:08 3 subcarriers. That's what the patent calls them. You can  
12:40:11 4 see them in the figure, sub1, sub2, sub3 along the bottom  
12:40:18 5 axis. Those are different frequencies. So a profile of a  
12:40:21 6 cable modem is across frequencies.

12:40:24 7 A profile of a group of cable modems could also be  
12:40:30 8 across frequencies. It has to be. In that case, we would  
12:40:36 9 cause it -- call it a composite profile.

12:40:38 10 So the two terms, "composite" on the one hand and  
12:40:42 11 "profile" on the other hand that are in the claims refer  
12:40:45 12 essentially to different dimensions.

12:40:48 13 "Composite" refers to across the cable modems of a  
12:40:53 14 group; whereas, "profile" refers across the frequencies.  
12:40:59 15 The frequencies may be of one cable modem, or they may be  
12:41:02 16 of the group. That depends. You can use it either way.  
12:41:08 17 If we're talking about frequencies for the entire group,  
12:41:10 18 that would be a composite profile. Composite for the  
12:41:15 19 group, profile for the frequencies.

12:41:17 20 What does the claim actually require? The claim  
12:41:19 21 says that we have to use a composite metric based on a  
12:41:24 22 worst-case profile. The composite metric is for the group.  
12:41:28 23 That's the group-level measure. It has to be based at  
12:41:31 24 least in part on what? Look at the orange highlighted  
12:41:36 25 claim language, on a worst-case SNR profile. Of what? Of

12:41:42 1 said SNR-related metrics.

12:41:46 2 And we've noted with the yellow arrow, where does  
12:41:50 3 the antecedent basis come from? The antecedent basis comes  
12:41:52 4 from the introductory element, and that antecedent basis is  
12:41:56 5 about each cable modem. So each cable modem has metrics,  
12:42:05 6 and the worst-case profile will be based -- will be of  
12:42:09 7 those metrics. So the worst-case profile is for each cable  
12:42:14 8 modem looking across frequencies.

12:42:15 9 That has to form at least part of the basis to  
12:42:21 10 inform our composite metric. Now, does the composite  
12:42:25 11 metric have to be one number or many? It can be one.  
12:42:28 12 That's what a metric is. It's a measure. Can it be more  
12:42:31 13 than one? Absolutely.

12:42:34 14 So what you can have is composite profiles. And  
12:42:38 15 when you put the two together, you have both across the  
12:42:45 16 cable modems and across the frequencies. And those are the  
12:42:49 17 examples which Mr. Benyacar is pointing out in the patent.  
12:42:52 18 And there's no question, Your Honor, that is the ultimate  
12:42:54 19 version of this patent.

12:42:55 20 When you get down to the granularity of individual  
12:42:59 21 frequencies for all of the cable modems in the group, that  
12:43:02 22 is its ultimate expression. But you don't have to have  
12:43:05 23 that.

12:43:05 24 A simple example is think about everybody in this  
12:43:08 25 room being divided up into the gray suits and the blue

12:43:11 1 suits, and the gray -- and we talk about, let's say, our  
12:43:14 2 academic performance in high school. Maybe I don't want to  
12:43:17 3 do that, but for our -- you know, how well did we do?

12:43:21 4 Okay. Well, what would a metric be for one of the  
12:43:24 5 groups? Well, a metric on its own might be what grade did  
12:43:28 6 you get in a class? The profile of metrics for me, an  
12:43:33 7 individual, would be across reading, English, mathematics,  
12:43:41 8 science, so that would be looking across the different  
12:43:43 9 metrics and their different aspects.

12:43:46 10 For cable modems, that's looking across the  
12:43:50 11 frequencies.

12:43:51 12 But I can do that on an individual basis. I don't  
12:43:53 13 have to do that on a group basis. I could. I could say  
12:43:58 14 that for the group, I want one metric, which takes all that  
12:44:04 15 into account, or I have to be as specific as having some  
12:44:08 16 separate value for each and every one of the subcarriers.  
12:44:13 17 But if I want to do that, I use the words "composite"  
12:44:18 18 together with "profile." And that's what Dependent Claim 6  
12:44:21 19 does.

12:44:22 20 In the dependent claim, we do use the two words  
12:44:27 21 linked together, "composite" and "profile." But the  
12:44:30 22 independent claim doesn't. The independent claim simply  
12:44:34 23 says that you have to generate a metric which can be a  
12:44:39 24 single measure. For example, an average. You could take  
12:44:43 25 an average of the signal-to-noise ratio values across all



12:44:48 1 the subcarriers. That's a metric. That could represent  
12:44:51 2 the group. Is the group really good? It will have a  
12:44:55 3 really high metric. Is it not good? It will have a low  
12:45:01 4 metric. That helps us decide what parameters to use.

12:45:03 5 The claim requires I do a little more work to get  
12:45:07 6 that metric, though, and what does it require, it requires  
12:45:10 7 that for the cable modems in my group, I look at their  
12:45:13 8 profiles.

12:45:13 9 So at the end of the day, what this boils down to  
12:45:17 10 is a disclosure question. It really is a written  
12:45:20 11 description question. And in terms of written description,  
12:45:25 12 I would simply say this, that when we look at what -- and  
12:45:28 13 this has happened many times today, but Charter's counsel  
12:45:32 14 tells us what the patent says, but over the course of doing  
12:45:34 15 that, actually just refers to examples and says, well,  
12:45:40 16 that's all the patent says.

12:45:41 17 So if we take a look at -- if I can change over to  
12:45:46 18 the ELMO. Thank you very much.

12:45:47 19 This is, right, what Mr. Benyacar said. Well,  
12:45:51 20 this is what the patent says. So we can see the citations  
12:45:58 21 here.

12:45:58 22 And we look at the examples that are given, which  
12:46:04 23 is this is a -- examples of composite worst-case SNR  
12:46:10 24 profile being used. Yeah, the patent does use that.  
12:46:13 25 There's no question about it. As I said, it's the ultimate

12:46:16 1 version of this.

12:46:17 2 In their briefing, they identify this example from  
12:46:19 3 Figure 3A, Block 308, and you can see it, Your Honor, here,  
12:46:23 4 Column 5, 40 to 46. But if we take a quick look at the  
12:46:27 5 patent, you'll notice -- could you switch me to the ELMO,  
12:46:33 6 please? Thank you very much.

12:46:34 7 You'll notice that that actually -- a flowchart  
12:46:40 8 into Figure 3A, of course, is an example process. It's an  
12:46:49 9 example process.

12:46:50 10 Is there more general disclosure in the patent?  
12:46:54 11 There is.

12:46:54 12 Could you switch me back to the slides? Thank you  
12:46:58 13 very much.

12:46:58 14 THE COURT: Let's see if we can finish up.

12:47:01 15 MR. BRIDGES: And here's the example of the  
12:47:02 16 general disclosure, Your Honor, on 4:40 to 56. You'll see  
12:47:07 17 that the patent says, look, you can have -- you can have  
12:47:08 18 measures per service group based on composite metrics of  
12:47:17 19 the cable modems assigned to that group, composite metrics.

12:47:21 20 There's no composite profile. The word "profile"  
12:47:24 21 is not being used, just the composite metric. That's what  
12:47:28 22 the claim is requiring.

12:47:29 23 Now, absolutely admittedly, there is an e.g. The  
12:47:34 24 e.g. is one example. The example is a composite profile.  
12:47:40 25 So there's no question that I could use a composite

12:47:45 1 profile, but I don't have to.

12:47:48 2 And we also don't have to guess in the patent what  
12:47:51 3 e.g. means because actually at Line -- or Column 2, Line  
12:47:54 4 47, the patent's explicit about this, that e.g. is a,  
12:47:59 5 quote, non-limiting example, instance, or illustration, and  
12:48:02 6 that's what's going on here.

12:48:03 7 So, again, I think that in reality, Your Honor,  
12:48:07 8 what we're really dealing with here is a written  
12:48:09 9 description question, which this is citation support for a  
12:48:14 10 more general disclosure.

12:48:17 11 The specific example, which is sort of the  
12:48:20 12 ultimate version of this invention that Mr. Benyacar walked  
12:48:24 13 through is an example, and we embrace that, but it is not  
12:48:29 14 the sole disclosure.

12:48:31 15 And this is simply not at the end of the day an  
12:48:34 16 indefiniteness issue because no one really complains what  
12:48:40 17 the terms mean. There's just a complaint that there's some  
12:48:43 18 kind of equivalence in the claim which renders it  
12:48:46 19 nonsensical.

12:48:47 20 THE COURT: All right. Okay. Thank you, Counsel.

12:48:50 21 Counsel, I told you we'd allocate three hours  
12:48:53 22 today. Even with our 10-minute recess, we're well over  
12:48:58 23 that, and I do have to be somewhere in about 12 minutes.

12:49:01 24 So I am going to take "services groups" and  
12:49:08 25 "[communicating with/corresponding to] said one of said

12:49:12 1 plurality of services groups" from the '682, I'm going to  
12:49:16 2 take those under submission and decide those on the  
12:49:20 3 briefing that you've given me.

12:49:21 4 The rest of these terms we've covered with  
12:49:24 5 thorough argument today, and I'll consider those also to be  
12:49:29 6 under submission to be determined by the Court based on  
12:49:33 7 your briefing and your capable arguments that have been  
12:49:37 8 presented as a part of claim construction.

12:49:38 9 That'll complete the claim construction process  
12:49:43 10 set for today. Thank you for your presence and your  
12:49:46 11 argument. You're excused.

12:49:48 12 The Court stands in recess.

12:49:49 13 COURT SECURITY OFFICER: All rise.

12:49:50 14 (Hearing concluded 12:49 p.m.)

15

16

17

18

19

20

21

22

23

24

25

CERTIFICATION

I HEREBY CERTIFY that the foregoing is a true and correct transcript from the stenographic notes of the proceedings in the above-entitled matter to the best of my ability.

/S/ Shelly Holmes  
SHELLY HOLMES, CSR, TCRR  
CERTIFIED SHORTHAND REPORTER  
State of Texas No.: 7804  
Expiration Date: 10/31/2023

6/27/2023  
Date